# Six Steps to Continuous Application Readiness

A comprehensive, automated approach to a predictable process for preparing and delivering any application to any device at any time.





## Six Steps to Continuous Application Readiness

#### Introduction

IT organizations are looking to transform how they deliver IT services to meet the growing demands of the business and are under intense pressure to deliver new computing platforms, keep operating systems up to date, and make quality applications easily accessible to end users. IT leaders are used to adapting to change, but it is increasingly important in today's digital business to rapidly keep up with technology and keep applications continually updated and available to corporate end users via selfservice. With upwards of 30% of an enterprise application portfolio requiring updates annually (a number that continues to grow with the increasing adoption of mobile applications), the increasing complexity of computing platforms in today's organizations is motivating IT to find better ways to deliver everyday application services and keep up with ongoing desktop migrations. Additionally, many organizations are looking to simultaneously deploy the latest technologies, such as application virtualization and mobile apps, to increase user productivity, simplify application management and reduce costs. More than ever, IT executives are asked to help drive business goals by

increasing business agility. The IT-as-a-service (ITaaS) model, with its strict adherence to service level agreements (SLAs) and its ability to increase adaptability and responsiveness, is core to increasing service quality and the speed of application service delivery. With respect to the application portfolio, it means reliable delivery within a time frame driven by the business — and not just based on when the IT resources are available.

Despite the business benefits of keeping up with Windows migrations or implementing new application technologies, these transitions can be taxing on everyone. For IT, they create extra work, longer hours, and higher stress as staff have to learn new technologies and consistently ensure the reliably of applications delivered to users, while adhering to strict IT governance and standards. Implementation failures can have major consequences. For employees, customers, and partners, they can disrupt access to vital services. For management, they often spell budget overruns and end-user complaints. For the enterprise as a whole, they can delay new strategic initiatives aimed at creating competitive advantages.

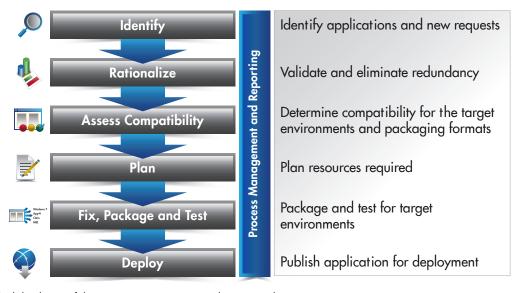


Figure 1: A high-level view of the six steps to continuous application readiness

Why are so many organizations still held hostage by technology transitions? Because adopting new technology is most often approached as a point-in-time project planned months in advance and is among the riskiest functions of IT. The scope and resources required continues to grow: discovery, cataloging, compatibility testing, remediation, conversion, packaging, virtualization, etc. Most organizations do not have a continuous process for delivering IT services in a reliable and predictable way on a daily basis.

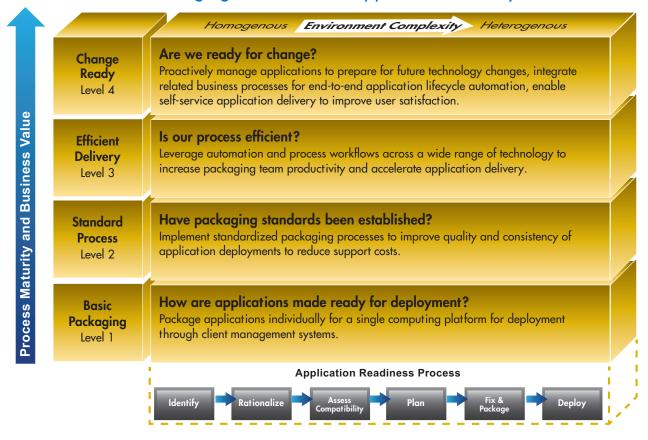
The new norm consists of managing the continual flow of new software releases along with business as usual application requests – with no additional resources. This is Application Readiness– a process to continually, reliably and predictably prepare and deliver any application to any device at any time.

That means every transition, whether it is a request for the latest OS, a single request for a business application, or a data center consolidation, should be undertaken with the future in mind. In other words, "Application Readiness" is really about successful service transition. The ultimate objective is to build a future-proof environment that adapts to both fast-changing technologies and ever-changing business service levels (SLAs) with equal ease. And that means Application Readiness should be approached as a continuous process. It should implement best practices and technologies to ensure consistency and optimal operations; it should leverage prior investments, such as packaging technology, wherever possible; it should automate each phase of the process; and it should standardize practices and procedures so that deployments are reliable and predictable.

With those overarching goals in mind, it becomes possible to evolve from a reactive, project-oriented approach to a proactive approach of continuous Application Readiness for every day application requests and desktop transformations.

Flexera Software has defined an Application Readiness Maturity Model that provides a framework for continual improvement. Use it as a guide to assess the current state and determine what can be done to advance the process. By understanding where your organization is in maturity, you will have a starting point to chart your path to higher levels of business value. Each step yields incremental efficiencies, resulting in faster and more reliable application delivery, lower costs, and decreased risk.

### Packaging to Predictable Application Delivery



Today, the critical need for Application Readiness is underscored by projects such as mobile application management and virtualization of applications and desktop infrastructure. However, with most organizations updating, repackaging and deploying over 30% of their applications annually, the requirement extends beyond the initial project into a need for ensuring continuous deployment.

This paper outlines the six key steps of an Application Readiness process, illustrates the major tasks within each phase, and explains how Flexera® Software's solutions, AdminStudio Suite and App Portal, can reduce the risk and cost of service transition by providing a consistent approach to delivering application services on a regular basis.

#### 6 Steps to Continuous Application Readiness Step 1: Identify

#### Identify What's Being Used (and What Isn't)

The first step requires obtaining an accurate view of the all applications deployed across the enterprise. This is a good time to analyze the application inventory and take stock of what is actually being used, as opposed to what is deployed. Depending on the end users' abilities to install applications locally, there may be applications that cannot be centrally monitored or managed, but could be crucial to the business and therefore must be identified.

The Flexera Software solution integrates with industryleading systems management technologies such as Symantec<sup>™</sup> Altiris Client Management Suite and Microsoft<sup>™</sup> System Center Configuration Manager (SCCM) to extract both application and hardware information as a baseline for continuous application readiness.

Organizations with an immature process will likely have difficulty identifying what applications are deployed and will not know which applications are actually in use within their enterprise. New requests for applications from the line of business (LOB) leaders are often handled manually, and are prone to duplication of effort. Alternatively in a mature process identifying new requests is automated to capture the requirements and documentation needs up front. The request process then executes other Application Readiness activities automatically to increase efficiency and reduce manual wait times between process steps. With a centralized application catalog, packagers are able to immediately know whether the requested application is new, or has already been packaged.

#### Step 2: Rationalize

## Rationalize to Cut Costs and Eliminate Unused and Duplicate Applications

With a clear view of both the deployed and used applications, you can rationalize the application estate to address application sprawl and reduce costs. This is a prime opportunity to verify the need for continued support of applications and to consolidate and reduce the number of supported products, versions and vendors, which directly benefits Software License Optimization efforts to reduce software, spend.

With the Flexera Software continuous Application Readiness approach, once the application inventory has been imported and catalogued, applications are classified and sorted by type, so that duplicate versions and multiple vendors within each type can be identified and consolidated. Identifying unused applications to retire can also generate significant cost savings for each application that no longer needs support. Identifying and removing applications that have reached their end of life and are no longer receiving updates, will also help to reduce security risks resulting from unpatched applications.

Based on Flexera Software engagements, estimates are that for each application removed from a migration project, savings can be between \$3000 and \$5000.

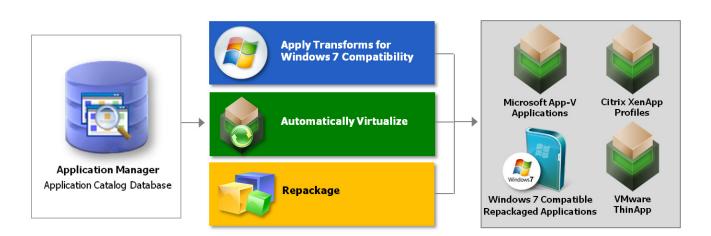


Figure 2: The Flexera Software solution simplifies the tasks of fixing compatibility issues and packaging applications into the desired deployment format.

This application consolidation process then becomes a key element of continuous application readiness. It is undertaken not as a point-in-time activity, but as part of the ongoing process as business users make new application requests.

Organizations that lack a centralized application catalog and have not rationalized their software portfolio are at the lowest level of maturity and are open to increased risks and higher costs. At the highest level of maturity requests are validated through automatic lookup of application information in a normalized application catalog, redundant applications are minimized and support costs are reduced.

#### Step 3: Assess Compatibility

#### Assess Compatibility and Determine Suitability for Target Platform

The increasing complexity of enterprise computing platforms makes it even more important to perform application compatibility testing before introducing new or updated applications into the enterprise environment. Doing so, will identify those applications that need to be fixed in order to run on the target platform and those with un-fixable compatibility issues that will need to be replaced or updated.

It is difficult to know which applications will have compatibility issues, and thus which will require remediation. A manual approach of installing and testing each application is extremely time consuming, and also it's difficult to exhaustively test all features of the application to ensure they work. Many applications may initially appear to work– but over time, as features and functions in the application are used, compatibility issues may arise. This can cause unpredictable application performance, crashes in the production environment and ultimately affect end user productivity.

In addition to assessing application compatibility on Windows, organizations that are implementing application virtualization should also check for application suitability for their chosen virtualization technology as not all applications can be converted to run as virtual applications.

The Flexera Software solution provides a highly effective method to quickly identify applications that have compatibility issues, and provides detailed information on the location, and specifics of the issue. The solution is fully automated, able to assess hundreds or thousands of applications and gives a view of the overall application compatibility across the application estate for both 32-bit and 64-bit versions of Windows, as well as suitability testing for application virtualization. This automated approach saves significant time compared with manual tools and clearly shows where to focus remediation efforts.

The packaging team does not perform compatibility assessment in an immature process, but instead relies on vendor documentation and waits until users call with issues before trying to trouble shoot any compatibility issues. With a mature process, new application are automatically assessed for compatibility across multiple target environments and multiple virtualization formats to improve service quality, reduce help desk calls, and increase end user satisfaction.

#### Step 4: Plan

#### Scope and Plan Application Delivery

Many organizations face challenges of not having adequate information to accurately scope and budget for application rollouts and desktop transformations. Since application compatibility is one of the most costly and time-consuming components of an application service transition, having an accurate view of the applications to be transitioned, and their readiness for the target platform, provides the information required to accurately budget and resource the project.

The work completed in the Rationalize and Assess Compatibility phases arms you with a list of rationalized applications and the details of compatibility issues that must be addressed. With this information you will have a clear view of the magnitude of the project enabling you to accurately calculate costs and likely duration timeframes for migration projects and business as usual application requests.

Traditionally IT has planned the delivery of applications and operating systems as a major IT project that are planned well in advance and involve rolling out new technology to functional groups all at once. This 'big bang' approach puts stress on IT operations and IT Support as well as the business users that must endure interruptions in their daily routine. Utilizing an <u>enterprise app store</u> can help relive that stress, smooth out the transition and provide business users the ability to choose when to install the new technology.

Planning is relatively nonexistent in low maturity organizations and resources are moved from one project to another depending on which group makes the most noise. Mature organizations have a clear understanding of compatibility issues and can accurately scope the resources required and predict application delivery to meet or exceed service levels.

#### Step 5: Fix & Package

Fix Compatibility Issues and Reliably Convert to Any Format Applications that presented issues during the "Assess Compatibility" phase must be fixed to run on the target platform.

Organizations implementing application virtualization or a virtual desktop infrastructure strategy need to convert applications to the required format for their chosen vendor's technology.

Application fixing and format conversion is a timeconsuming, manual process, so utilizing technology to automate these tasks and leveraging the investment in packaged applications will yield considerable savings and ensure a consistent approach to Application Readiness.

The Flexera Software solution automates the complex process of fixing compatibility issues, packaging, and converting applications to the required deployment format. It helps IT organizations quickly and reliably prepare applications on a daily basis and for ongoing migrations and virtualization. By standardizing or implementing software packaging, you can reliably repackage applications in minutes and deploy software to desktops with 99 percent success or better.

Equally important, the Flexera Software solution can support your application virtualization strategies, enabling the quick conversion of applications for technologies such as Microsoft App-V<sup>™</sup>, VMware ThinApp<sup>™</sup>, and Citrix XenApp<sup>™</sup>. It simplifies the move to application virtualization by identifying which MSIs are good virtualization candidates and converting them to virtual packages automatically—with no extra repackaging required. And by taking a vendor-neutral approach, the Flexera Software solution maximizes your flexibility while directly addressing some of the biggest challenges of virtualization. For example:

- You don't need to start from scratch when you move to the virtualization model because the solution has a clear, fast and complete process for converting legacy and existing MSI packages to virtual packages (or applications).
- Learning curves are minimal because the solution replaces the need for multiple vendor specific application packaging tools.

Software packaging is done in a one-off manner in an organization at the bottom of the maturity scale. Individual packagers do whatever it takes to package the requested application, often with a lack of consistency that can negatively impact quality and ultimately user satisfaction. At the top end of the maturity scale, packaging standards and best practices are "codified" to do many of the packaging tasks automatically. A consistent process is used to manage physical, virtual and mobile applications.

#### Step 6: Deploy

#### Predictably Deploy Packaged Applications

Technology trends and innovation are increasing the number of deployment types and target devices. Through the continuous Application Readiness approach, you can automate and accelerate the process of deploying uniform applications directly to your configuration management system, mobile device manager, or enterprise app store – without additional copying of files. Predictable application delivery enables IT operations to exceed service levels and gives business users greater speed and access to more applications on a growing number of devices.

For example, the Flexera Software solution can pass packages to virtually any deployment solution, including Microsoft System Center Configuration Manager, Symantec<sup>™</sup> Altiris Client Management Suite, LANDesk<sup>®</sup> Management Suite, Novell<sup>®</sup> Zenworks<sup>®</sup>, and simultaneously create a new catalog item in App Portal, the enterprise app store, where it is immediately available to the end users that need it. It also facilitates distributing packages and patches via network destinations, FTP servers, administrative installations, and more through the Distribution Wizard feature. In addition, use the same process to deliver mobile applications directly to Microsoft System Center Configuration Manager with Windows Intune Connector, AirWatch<sup>®</sup> Mobile Device Management, and other mobile device management systems.

In organizations that lack process maturity, the packaging team manually hands the application off to the deployment administrator with no specific information on how to add the application to the deployment system. Some duplication of effort may occur and the process is manually tracked through email or a help desk ticketing system. On the other hand in a mature process system to system automation transfers the application package and complete meta data to the deployment system, saving huge amounts of time, ensuring accuracy, and providing feedback on the success or failure of deployment to improve the process and package quality.

#### Managing Workflow through the Six Step Application Readiness Process

When the processes for preparing applications for deployment is managed poorly, expensive errors can occur that result in costly delays, software downtime, and a loss of productivity. Flexera Software's Workflow Manager helps to standardize, control, and automate the Application Readiness process, reducing costs and maximizing productivity. The Workflow Manager Dashboard displays a real-time status of every request, who is working on it, and any related issues, so you can take action to ensure SLAs are met. Whenever packaging issues arise, Workflow Manager facilitates resolution with dynamic emails to IT staff or stakeholders to notify them of the details of the request and the issues to be resolved, increasing operational efficiency and keeping the right people informed.

#### Conclusion

The six-step process for continuous Application Readiness allows you to shift from reactive to proactive application management. The result is the ability to define, track and deliver the speed and quality of service delivery the enterprise expects when it comes to obtaining software applications at work. The Flexera Software solution is a source of significant benefits for many groups within the enterprise and for the business as a whole.

- IT leaders can significantly reduce the cost and complexity of major service transitions and increase the ability to adapt and scale in response to changes in technology and business needs.
- IT operations managers can increases predictability in terms of outputs and measurements to accurately scope and budget for service transitions so there are no surprises.
- IT service delivery managers can exceed SLAs and deliver services to the business faster and more reliably.
- Developers can spend less time dealing with application conflicts and compatibility issues and focus more time on adding the new features end users are requesting.
- Employees, customers, and partners get faster and more reliable access to the latest technology, without outages or interruptions in service.
- The enterprise gains a new level of agility in responding to fast-changing business conditions, competitive threats, and customer needs.

#### The Next Step: Integrate Business Processes and Manage the Entire Application Lifecycle

Addressing the challenge of silos is essential to successfully guiding an enterprise through crucial technology initiatives like desktop transformation, consumerization of IT and cloud computing. You can achieve success in these areas by embracing Application Usage Management, an integrated and centralized approach to maximizing software value and optimizing usage across the application lifecycle.

With the unified Application Usage Management approach, you can implement and automate workflows across functional areas of your organization. Flexera Software has integrated its market leading AdminStudio Suite, App Portal and FlexNet Manager Suite to unify the Application Readiness and Software License Optimization processes. This combination of three best-of-breed products brings new automation and data sharing capabilities to enable the holistic Application Usage Management approach. This strategic approach helps you gain optimum value from applications, ensure continual license compliance, drive down software spend and reduce operational costs. And most of all keeps your end users productive and your business innovative.

#### For More Information

To learn more, contact Flexera Software at 1-800-809-5659 to speak directly with a representative.

#### **About Flexera Software**

Flexera Software helps application producers and enterprises increase application usage and the value they derive from their software. Our next-generation software licensing, compliance and installation solutions are essential to ensure continuous licensing compliance, optimized software investments and to future-proof businesses against the risks and costs of constantly changing technology. Over 80,000 customers turn to Flexera Software as a trusted and neutral source for the knowledge and expertise we have gained as the marketplace leader in licensing, installation and compliance for over 20 years and for the automation and intelligence designed into our products. For more information, please go to:

www.flexerasoftware.com



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