Created as of January 24, 2017

The information in this document applies to Sage 100 Advanced Version 2016. Detailed product update information and support policies can be found on the Sage Support website at: <u>https://support.na.sage.com/</u>. This document is intended to cover information regarding the compatibility of various operating systems with Sage 100 Advanced as of January 24, 2017. Any operating system not listed should be considered *incompatible*.

Note: It is critical that before and during an installation, this document be thoroughly reviewed, along with the *Sage 100 Installation and System Administrator's Guide* and other documents found on the How to install Sage 100 and locate installation and upgrade information page on the Sage Support website. To access this page, log into the <u>https://support.na.sage.com/</u> and in the search field type **18216** and click **Search** button.

If development partner or Extended Solutions customizations or modifications have been made to your Sage 100 Advanced software, coordinate with your Sage business partner and your development partner before installing Sage 100 Advanced.

For information about Integrated Solutions Compatibility Matrix, logon to the Sage Support website at: <u>https://support.na.sage.com</u> / and refer KB **48274**. Sage 100 versions 2015 phone and web case support (retirement) will end on September 30, 2018. For more information, refer KB **31477**.

Web site content can change at any time. Sage has no control over, and cannot be responsible for, the content of other companies' websites. **If your platform is not listed in the matrices below, it is not supported.**

Supported Workstations	Remarks
Windows 10 (32 and 64-bit) Pro and Enterprise	 Notes Windows 7 Home Basic and Windows 7 Home Premium editions are not supported.
Windows 8.1(32 and 64-bit) Pro and Enterprise	
Windows 8 (32 and 64-bit) Pro and Enterprise	
Windows 7 (32 and 64-bit) Professional, Enterprise and Ultimate Service Pack 1	

Microsoft Dedicated Servers defined as Operating System software specifically designed to be used as a network server (not peer-to-peer)				
Supported Servers	Remarks			
Windows Server 2016 Windows Server 2012 R2 (64-bit) Standard Windows Server 2012 (64-bit) Standard	 Notes Sage 100 Advanced is a 32- bit application and will run seamlessly on a 64-bit operating system utilizing the WOW64 x86 emulator. If eBusiness Manager is installed, the ISAPI Plug-in must be installed manually for new Sage 100 installations. If a Windows Server 2008 R2 64-bit server is used as the IIS Server to connect to the Sage Web Engine, the Application Pool specified for the Web site must have True selected for the Enable 32-Bit Applications option. The eBusiness Web Services service can be installed only on a Windows Server platform, such as Windows Server 2008 R2, 2012 or 2012 R2. For more information, see the <i>eBusiness Web Services Installation Guide</i> Webservices.pdf found by clicking the Documentations directory on the Sage 100 Advanced Autorun window of the install DVD. 			
	 Recommendations Sage 100 Advanced should be installed on a dedicated member/application server. Although supported, certain Windows server configurations are not recommended due to possible instability and performance issues. Support from Sage Customer Support may be limited in the following circumstances: Running Sage 100 Advanced on a Windows server acting as an Active Directory domain controller managing a large number of user accounts, computer accounts, group policies, organizational units, remote sites, or other network resources. Running Sage 100 Advanced on any server actively running other applications or services, such as e-mail (for example, Exchange Server), IIS, fax programs, SQL Server, or other software. Not Supported The items listed here are intended to be used for clarification purposes only, and are not intended to represent a comprehensive list of exclusions. Running Sage 100 Advanced on any Windows Small Business Server operating system – regardless of the number of user and computer accounts it is managing, is not supported. Small Business Server runs Active Directory and Exchange Server by default, and that has been a factor in many reported cases of instability and performance issues. Instability may also result if Small Business Server is further configured to run other applications concurrently, such as IIS, Shared Fax Services, and SQL Server. Using a server operating system as a Sage 100 Advanced workstation is not supported (not even as a client to another server). However, this configuration can be utilized for testing. Sage 100 and SageCRM Suite were not designed for any version of Windows Datacenter Server and are not supported on this platform. Windows Server 2008 – As a result of Microsoft's decision to no longer tru			

SageCRM Supported Server	Remarks		
Windows Server 2016 Windows Server 2012 R2 (64-bit) Standard Windows Server 2012 (64-bit) Standard Windows Server 2008 R2 (64-bit) Standard and Enterprise Service Pack 1	 Notes Microsoft SQL Server is required for Sage CRM Server. Sage CRM 7.3 can be installed on MS SQL Server 2008 R2 and 2012 SP1 Standard and Enterprise editions, MS SQL Server 2012 SP2, MS SQL Server 2014, and MS SQL Server 2016. Sage CRM Server cannot be installed on a server running Microsoft Exchange or Lotus Notes Domino. Outlook Plug-In for SageCRM To install CRM Outlook Integration, download the Outlook plug-in from within CRM in the My CRM menu > Preferences tab. The user must be an Administrator or Power User of the client machine to install the Outlook plug-in. If installing the CRM Outlook Integration in a Remote Desktop Services environment, administrator rights are required on the Remote Desktop Services machine. All instances of Internet Explorer and Outlook must be close to install the plug-in. At the time of the installation, exclusive access to the server is required for each user. After the plug-in is installed, administrator rights are no longer required. 		
Remote Desktop Services/Citrix Supported Servers	CRM Outlook client integration is supported only for e-mail accounts running on Microsoft Exchange Server. Remarks		
 Windows Server 2016 Windows Server 2012 R2 (64-bit) Standard Windows Server 2012 (64-bit) Standard Windows Server 2008 R2 (64-bit) Standard and Enterprise Service Pack 1 Citrix XenApp 6.5 Citrix XenApp 7.5 Citrix XenApp 7.6 	 Notes Remote Desktop Services is the new name for former Terminal Services Service. Remote Desktop Services or Citrix must be installed on a supported version of Windows Server. Installing Sage 100 Advanced or SageCRM Server on the same server as Remote Desktop Services or Citrix is not supported. Windows thin clients are supported with Remote Desktop Services and Citrix. For more information, refer to www.microsoft.com For more information on Remote Desktop Services/Citrix, see the Miscellaneous Notes section in this document. SageCRM Notes Running SageCRM through Remote Desktop Services or Citrix is only supported when run through a remote session to the Desktop and not as a Published Application. 		

Created as of January 24, 2017

Virtual Platforms

Notes

- Sage 100 is currently supported on virtual environments where the Virtual Vendor supports the Windows OS that Sage 100 supports.
- All supported Operating Systems listed under the Supported Workstations, Sage 100 Supported Servers and SageCRM Supported Servers sections are supported when hosted on these Citrix virtual platform products.
- Hardware and software requirements (minimum and recommended) for Sage 100 products apply to virtual environments as well.
- Some third party products might not support the same virtualization platforms as Sage 100 products. For verification, please check with the third party vendor.

Miscellaneous Notes

- 1. When running Sage 100 Advanced over a local area network (LAN) environment, the ping timings will vary depending on the speed and configuration of the network. Typical ping timings with 1,800 bytes of data should be 20–30 milliseconds or faster. Unacceptable ping speeds are over 40 milliseconds.
- 2. In the Sage 100 Advanced client/server environment, integrated applications do their processing at the workstation, not at the server. As a result, users may experience performance issues when running integrated applications from remote locations. Some of the applications affected include Crystal Reports.

Sage 100 Advanced includes a client/server based ODBC driver. This can be used instead of the client ODBC driver for faster processing.

- 3. Virtual private network (VPN) and wide area network (WAN) connections should be set up as point-to-point connections, as opposed to Internet connections, for better stability and performance. If an Internet connection is used, ensure the Internet Service Provider (ISP) can provide a guaranteed bandwidth; otherwise, users may experience dropped sessions and lost connections. With any type of low speed WAN connection, for each remote user, select the Low Speed Connection checkbox in User Maintenance.
- 4. If a VPN connection is used, keep in mind the following:
 - VPN solutions are either software-based, hardware-based (such as a VPN firewall), or a hybrid of both.
 - If a hardware-based solution is used on Level 3.x, verify that it supports secure, encrypted connections for applications that use back channels.
 - Software-based VPNs result in slower connection speeds due to the security overhead of encrypting the data. Hardware-based solutions run faster.

- Low-speed connections are subject to considerable performance issues when using a software-based VPN. It may cause the connection to have a bandwidth of less than 128 Kbps. For information on guaranteed bandwidth requirements, see miscellaneous note above.
- Printing or previewing Crystal Reports and forms will require the Client Server driver (see miscellaneous note 3), or a Terminal Server or Citrix connection.
- 5. Suggestions for faster remote printing of Crystal reports over a WAN and virtual private network (VPN) are:
 - Using the Sage 100 Advanced Client/Server ODBC driver provided with Sage 100
 - Using Citrix or Remote Desktop Services
- 6. Always run Workstation Setup after installing, re-installing, or upgrading the Windows operating system, and verify that the Windows printers in Control Panel > Printers are still operational.
- 7. Verify that all hardware involved in running Sage 100 Advanced is on your operating system vendor's Hardware Compatibility List. Incompatible hardware can cause severe data corruption. For more information, refer to the Microsoft Hardware Compatibility List at: <u>http://www.microsoft.com/whdc/hcl/default.mspx</u>
- 8. The eBusiness Manager module may have additional separate program fixes for the Web Engine. You should apply the latest Web Engine bundle. Latest program updates can be accessed from **23500** at: <u>https://support.na.sage.com/</u>
- 9. If third-party enhancements are installed, always contact your development partner to verify compatibility before installing any updates. Also note that some program fixes are specifically excluded from the program fix collection and should be installed only if you are experiencing the problem they address.
- 10. The eBusiness Web Services service can be installed only on a Windows Server platform, such as Windows Server 2008 R2, 2012 or 2012 R2. For more information, see the *eBusiness Web Services Installation Guide* found by clicking the Documentation link of the Sage 100 Advanced Autorun window.
- 11. Always validate compatibility of development partner enhancements before upgrading.
- 12. Sage is committed to supporting future Microsoft operating systems as they are released to market for all Sage 100 Advanced modules; however, Sage does not support beta-level operating systems. As new operating system levels are scheduled for general release, Sage will verify their compatibility, and this document will be updated when Sage's evaluations are completed.
- 13. Sage requires a guaranteed minimum bandwidth of 128 Kbps per user for running Sage 100 Advanced through a low speed remote connection. For each user, 256k or higher is recommended. Select the Low Speed Connection check box in the Sage 100 Advanced User Maintenance task.
- 14. TCP/IP must be installed and properly configured so that you can ping by computer name and IP address from the workstation to the server. The server must be able to ping the workstation by IP address. You must be able to use the Windows TELNET.EXE utility or equivalent to communicate with the Application Server on a specific port ID and IP address, or on a specific port ID and name from all workstations to the server. If this cannot be done, you must contact your Microsoft support organization. Sage Customer Support cannot assist with this task. For more information on connection requirements, refer to your *Sage 100 Installation and System Administrator's Guide*.
- 15. The Sage 100 Advanced Application Server is a Windows Sockets application that listens on a single port (default port 10000). You must open this port on your firewall/router so clients can properly connect to the Application Server. The client does not listen back on its own port, so opening ports for clients is not necessary. Also, the Application Server is compatible with Network Address Translation (NAT).
- 16. If the Sage 100 Advanced Application Server is configured to run as a service and you are experiencing "connection timed out" errors, white screens, hanging, or slow performance, but only after a certain number of Sage 100 Advance users are in the system, review document **20344** on Sage Online at https://support.na.sage.com/. If you

Created as of January 24, 2017

are running the Application Server on the desktop instead of running it as a service, the same problem may occur in a very large multi-user environment. If that is the case, review document **20344** on Sage Support websites.

- 17. Wireless local area networks (WLANs) are not recommended for desktop or laptop connections, because using a wireless LAN may result in dropped packets and lost connections.
- 18. The Microsoft Fax Services feature provided with Windows Server 2008 R2, 2012, 2012 R2, Windows 7, Windows 8 and Windows 8.1 are supported with Paperless Office and batch faxing. For more information, refer to the Integrated Solutions Compatibility Matrix on the Sage Support website at: <u>https://support.na.sage.com/</u>

Recommended Minimum System Configuration						
	Recommended Minimum ¹					
Client Workstation	Processor	Physical Memory (RAM)	Available Memory (RAM) ²			
Workstation (client) operating system versions not listed in this document will not be supported with Sage 100 Advanced 2016.						
Windows 10 (32 and 64-bit) Pro and Enterprise	Intel Core 2 Duo	3 GB	512 MB			
Windows 8.1(32 and 64-bit) Pro and Enterprise	Intel Core 2 Duo	2 GB	512 MB			
Windows 8 (32 and 64-bit) Pro and Enterprise	Intel Core 2 Duo	2 GB	512 MB			
Windows 7(32 and 64-bit) Professional, Enterprise, and Ultimate	Intel Core 2 Duo	2 GB	512 MB			
Network Bandwidth	Recommended Minimum					
	100 Base-T – 100 Mbps at Full Duplex					

¹The recommended minimum is designed to ensure that the systems used for Sage 100 Advanced are capable of providing adequate performance with a standard complement of normally installed applications, such as virus protection software.

² Regardless of the recommended minimums specified above, users should check the available memory on the workstation prior to installing Sage 100 Advanced and use the Windows Task Manager to check the Available Physical Memory on the Performance tab. A minimum of 512 MB of physical RAM should be available to Sage 100 Advanced when all other applications that will be used with Sage 100 Advanced are loaded. Sage cannot guarantee acceptable performance when running Sage 100 concurrently with other applications that consume system resources required for Sage 100 to perform at an optimum level. Refer to the article "How to determine memory" on the Sage Online Web site at: https://support.na.sage.com/

Recommended Minimum System Configuration for Sage 100 and SageCRM Servers					
	Recommended Minimum ¹				
Sage 100 and SageCRM Supported Servers	Processor	Memory (RAM)	Additional Requirements		
Windows Server 2016		2 GB + 4-6 MB per concurrent user	100 Mbps network connection		
Windows Server 2012 R2 (64-bit) Standard					
Windows Server 2012 (64-bit) Standard	For 64-bit systems: Intel or AMD 64-bit capable, such as Intel Xeon or Quad-Core AMD Opteron				
Windows Server 2008 R2 (32 and 64-bit) Standard and Enterprise					
Remote Desktop Services and Citrix	For 32-bit systems:	Memory (RAM)	Additional Requirements		
Windows Server 2016 Windows Server 2012 R2 Windows Server 2012 Windows Server 2008 R2	Intel Pentium 4 class 2.4 GHz Dual processor recommended	Recommended minimum and as required by Remote Desktop Services or Citrix, plus 128 MB per concurrent user ²	100 Mbps network connection		
Citrix XenApp 6.5 Citrix XenApp 7.5 Citrix XenApp 7.6					
Sage 100 and Sage CRM Web Servers		Memory (RAM)	Additional Requirements		
Windows Server 2016 Windows Server 2012 R2 Windows Server 2012		2 GB	Internet Information Services 8.0 & 8.5		
Windows Server 2008 R2		2 GB	Internet Information Services 7.5		
E-mail Servers	Processor	Memory (RAM)	Additional Requirements		
Microsoft Exchange Server 2016 Microsoft Exchange Server 2013 Microsoft Exchange Server 2010	Intel Pentium 4 class 2.8 GHz	2 GB	100 Mbps network connection		

¹ The recommended minimum is designed to ensure the systems used for Sage 100 Advanced are capable of providing adequate performance with a standard complement of normally installed applications, such as virus protection software.

² 128 MB is based on an average of three concurrent tasks per user (Sage 100 Advanced Desktop plus two additional tasks, such as Sales Order Entry or Customer Maintenance). Averages of more than three concurrent tasks per user will require additional RAM.