

New Features Guide

Appeon® 6.5 for PowerBuilder®

DOCUMENT ID: DC20033-01-0650-01

LAST REVISED: November 2010

Copyright © 2010 by Appeon Corporation. All rights reserved.

This publication pertains to Appeon software and to any subsequent release until otherwise indicated in new editions or technical notes. Information in this document is subject to change without notice. The software described herein is furnished under a license agreement, and it may be used or copied only in accordance with the terms of that agreement.

No part of this publication may be reproduced, transmitted, or translated in any form or by any means, electronic, mechanical, manual, optical, or otherwise, without the prior written permission of Appeon Corporation.

Appeon, the Appeon logo, Appeon Developer, Appeon Enterprise Manager, AEM, Appeon Server and Appeon Server Web Component are trademarks or registered trademarks of Appeon Corporation.

Sybase, Adaptive Server Anywhere, Adaptive Server Enterprise, iAnywhere and PowerBuilder, are trademarks or registered trademarks of Sybase, Inc.

Java, JDBC and JDK are trademarks or registered trademarks of Sun, Inc.

All other company and product names used herein may be trademarks or registered trademarks of their respective companies.

Use, duplication, or disclosure by the government is subject to the restrictions set forth in subparagraph (c)(1)(ii) of DFARS 52.227-7013 for the DOD and as set forth in FAR 52.227-19(a)-(d) for civilian agencies.

Appeon Corporation, 1/F, Shell Industrial Building, 12 Lee Chung Street, Chai Wan District, Hong Kong.

Contents

1 About This Book	1
1.1 Audience	1
1.2 How to use this book	1
1.3 Related documents	1
1.4 If you need help.....	2
2 What's new in Appeon 6.5	3
2.1 New Supported PowerBuilder Features	3
2.1.1 PowerScript Features	3
2.1.2 DataWindow Enhancements	3
2.1.3 Web Enhancements.....	3
2.1.4 PowerBuilder Version	3
2.1.5 Operating system enhancement	3
2.2 New Features in Appeon installation	3
2.2.1 System Requirements.....	3
2.2.2 Able to install Appeon Server to multiple Application Servers on the same computer	4
2.2.3 Appeon PDFPrinter setup program is removed	5
2.2.4 Improve the system database	5
2.3 New Features in Appeon Developer.....	5
2.3.1 PB 12 Classic support.....	5
2.3.2 Application Profile Name in Application Deployment Package is modifiable	5
2.3.3 Exporting/Importing an application profile	5
2.3.4 Summary view of application profile configurations	5
2.3.5 Selectable compression method for JBoss, WebSphere, or WebLogic Web server.....	5
2.3.6 New performance settings	5
2.3.7 New connection cache properties	6
2.3.8 Strengthen password encryption.....	6
2.4 New Features in Appeon Server	6
2.4.1 Support JBoss.....	6
2.4.2 Support 64-bit OS	6
2.4.3 Improve licensing mechanism.....	6
2.5 New Features in AEM	6
2.5.1 New Connection Cache properties	6
2.5.2 New Configuration backup tool	7
2.5.3 New Application Title setting	7
2.5.4 Web service DataWindow.....	7
2.5.5 New Upgrade License button in Licensing page	7
2.5.6 New client settings	7
2.6 New Features in Appeon Server Web Component.....	7
2.6.1 Supports 64-bit OS	7
2.6.2 Supports IE 8	8
2.6.3 Appeon Performance Analyzer	8
2.6.4 Auto-block system error messagesAuto-block system error messages	8
2.6.5 Support QTP	8

2.7 New Features in Appeon Workarounds PBL	8
Index	9

1 About This Book

1.1 Audience

This book introduces new features added in Appeon 6.5 for PowerBuilder.

1.2 How to use this book

There are three chapters in this book.

Chapter 1: About This Book

A general description of this book.

Chapter 2: What's New in Appeon 6.5

Describes new features added in Appeon 6.5.

1.3 Related documents

Appeon provides the following user documents to assist you in understanding Appeon for PowerBuilder and its capabilities:

- *Appeon Demo Applications Tutorial*:

Introduces Appeon's demo applications; including the Appeon Sales Application Demo, Appeon Code Examples, and the Appeon ACF Demo, which show Appeon's capabilities in converting PowerBuilder applications to the Web.

- *Appeon Developer User Guide* (or *Working with Appeon Developer Toolbar*)

Provides instructions on how to use the Appeon Developer toolbar in Appeon 6.5.

Working with Appeon Developer Toolbar is an HTML version of the *Appeon Developer User Guide*.

- *Appeon Server Configuration Guide*

Provides instructions on how to configure Appeon Server Status Monitor, establish connections between Appeon Server and Database Server, and configure AEM for maintaining Appeon Server and Appeon deployed Web applications.

- *Appeon Supported Features Guide* (or *Appeon Features Help*):

Provides a detailed list of supported PowerBuilder features, which can be converted to the Web with Appeon 6.5 using the Appeon Xcelerator deployment option, as well as a list of unsupported features.

Appeon Features Help is an HTML version of the *Appeon Supported Features Guide*

- *Appeon Installation Guide*:

Provides instructions for installing *Appeon for PowerBuilder*.

- *Appeon Migration Guide*:

A process-oriented guide that illustrates the Appeon Web migration procedure and various topics related to steps in the procedure, and includes a tutorial that walks the user through the entire process of deploying a small PowerBuilder application to the Web.

- *Apppeon Performance Tuning Guide:*

Provides instructions on modifying a PowerBuilder application to achieve better performance from the corresponding Web application.

- *Apppeon Troubleshooting Guide:*

Provides information on troubleshooting issues; covering topics such as product installation, Web deployment, AEM, and Web application runtime.

- *Introduction to Apppeon:*

Guides you through all the documents included in Apppeon 6.5 for PowerBuilder.

- *New Features Guide (or What's New in Apppeon):*

Introduces new features and changes in Apppeon 6.5 for PowerBuilder.

What's New in Apppeon is an HTML version of the *New Features Guide*.

1.4 If you need help

Each Sybase installation that includes the purchase of a support contract provides for one or more designated people within your organization to be authorized to contact Sybase Technical Support or an Authorized Sybase Support Partner. If you have any questions about this product or need assistance during the installation process, ask the designated person to contact Sybase Technical Support or an Authorized Sybase Support Partner according to your support contract. You may access the Technical Support Web site at: <http://www.sybase.com/support>).

2 What's new in Appeon 6.5

The following new features are supported by Appeon® 6.5 for PowerBuilder®.

2.1 New Supported PowerBuilder Features

The following new PowerBuilder features are added to Appeon 6.5 for PowerBuilder. For detailed description of these new features, refer to the *Appeon Features Help*.

2.1.1 PowerScript Features

- Supports Byte functions, including Blob, Byte, GetByte, SetByte, and GetByteArray.
- Supports FileReadEX/FileWriteEX functions.

2.1.2 DataWindow Enhancements

- Supports WSCConnect Object and related functions and events.
- Supports using Web service as the DataWindow data source.
- Supports use 255 and 256 as the valid Paper.Size value.
- Supports the following print properties of the DataWindow object: CustomPage.Width and CustomPage.Length.
- Supports dynamically creating Datawindows in TreeView presentation style.
- Supports the SaveAs PDF in DataWindows.

2.1.3 Web Enhancements

- Supports calling Web Service through AppeonWebServiceComponent
- Extends the supported save as type to JPG, BMP, and GIF.

2.1.4 PowerBuilder Version

- Extends the support to PowerBuilder 12 Classic Edition

2.1.5 Operating system enhancement

- Supports Windows 7.

2.2 New Features in Appeon installation

2.2.1 System Requirements

Refer to *Installation Requirements* in the *Appeon Installation Guide* for details on system requirements. The following highlights the key system requirements for Appeon 6.5:

2.2.1.a Client requirements

- Microsoft Internet Explorer 6.0 SP2, 7.0, or 8.0
- Microsoft Windows 2000 SP4, Windows Server 2003 SP2, Windows XP SP3, Windows Vista SP2, Windows Server 2008 SP2, or Windows 7

2.2.1.b Apeon Developer requirements

- Microsoft Windows 2000 SP4, Windows Server 2003 SP2, Windows Server 2008 SP2, Windows XP SP3, Windows Vista SP2, or Windows 7
- Sybase PowerBuilder 9.0.3 (build 8784), 10.2.1 (build 9914), 10.5.2 (build 7826), 11.2 (build 8669), 11.5 (build 3127), or 12.0 (build 3517)

2.2.1.c Apeon Server requirements

- Windows Server 2003 SP2, Windows Server 2008 SP2, Windows Server 2000 SP4, Windows XP SP3, Windows Vista SP2, or Windows 7
- Any of the following Java servers:
 - Sybase EAServer 5.5 or 6.3 with Sybase PowerBuilder® Virtual Machine (PBVM) 9.0.3 (build 8784), 10.2.1 (build 9914), 10.5.2 (build 7826), 11.2 (build 8669), 11.5 (build 3127), or 12.0 (build 3517)
 - IBM WebSphere 6.1 or 7.0
 - Oracle Weblogic 9.2, 10.3, or 11g
 - JBoss 5.1.0.GA
- Sun Java 2 JDK 1.5 or 1.6

2.2.1.d Web Server requirements

- Apache 1.3, 2.0, or 2.2, Microsoft IIS 5.0, 6.0, 7.0, or 7.5, Sybase EAServer 5.5 or 6.3, IBM WebSphere 6.1 or 7.0, Oracle WebLogic 9.2, 10.3, or 11g, or JBoss 5.1.0.GA

2.2.1.e Database server requirements

- Sybase Adaptive Server Anywhere 7.0.4, 8.0.2, 9.0, 10.0.1, 11.0, or 12.0 with Sybase iAnywhere or jConnect JDBC driver
- Sybase Adaptive Server Enterprise (ASE) 12.5.x or 15.x with Sybase jConnect or iAnywhere JDBC driver
- Sybase Adaptive Server Anywhere WEB Edition with Sybase jConnect or iAnywhere JDBC driver
- Sybase IQ 12.6x or 12.7.x with jConnect JDBC driver
- Oracle 8i, 9i, 10g, or 11g with Oracle JDBC driver
- Microsoft SQL Server 2000 SP4, 2005 SP1, or 2008 with MSFT JDBC driver or JTDS driver
- IBM DB2 UDB 8.1, 8.2, or 9.5 with IBM JDBC driver
- Informix 7.x, 8.x, 9.x, or 10.x with IBM JDBC driver

2.2.2 Able to install Apeon Server to multiple Application Servers on the same computer

For Developer Edition and Trial Edition, if more than one application servers such as WebLogic, WebSphere etc. are installed on the same computer, you can repeatedly run the setup program to install Apeon Server to these application servers, for example, you first run the setup program to install Apeon Server for WebLogic, you can then run the setup

program again and select Apeon Server for WebSphere to install Apeon Server to the WebSphere application server.

2.2.3 Apeon PDFPrinter setup program is removed

Apeon PDFPrinter setup program is removed. You no longer need to install the PDF printer to do PDF printing, you can directly use the PDF SaveAs feature.

2.2.4 Improve the system database

Apeon 6.5 modifies the system database to use SQLite, because SQLite can improve the performance by reducing the application cubage.

2.3 New Features in Apeon Developer

2.3.1 PB 12 Classic support

Apeon Developer supports PB 12 Classic.

2.3.2 Application Profile Name in Application Deployment Package is modifiable

You can now modify the Application Profile Name in the application deployment. The Application Profile Name is used as the application name to identify the application. This means that you can install multiple instances of the same application on the same server, by running the setup package repeatedly and specifying different Application Profile Name.

2.3.3 Exporting/Importing an application profile

You can now use the Export and Import buttons in the Application Profiles tab to back up and restore the configuration of one or more application profile(s), for instance, if you want to transfer the configuration of application profile(s) to another Apeon Developer.

The application profiles are exported as XML file.

2.3.4 Summary view of application profile configurations

You can now review and modify all of the configurations of an application profile in a tab page called Summary. The application profile and its configurations are listed in a treeview structure.

2.3.5 Selectable compression method for JBoss, WebSphere, or WebLogic Web server

You can select to use the Apeon compression method or JDK compression method to compress the Web files into War or Jar packages when deployed to JBoss, WebSphere, or WebLogic Web server.

2.3.6 New performance settings

Two new performance settings are added to the application profile:

- Performance Analyzer compliance -- Enables the application to be deployed in a mode compliant with the Performance Analyzer tool. The application deployed with this setting can run with the Performance Analyzer tool to diagnose the performance issues at runtime.

- Download ActiveX files in a single thread -- Downloads the two ActiveX files in the same thread at runtime. Using the same thread to download the two ActiveX files can speed up the download under particular network conditions.

2.3.7 New connection cache properties

Several new connection cache properties are added to the connection cache profile:

- Command Timeout (seconds)
- Connection Lifetime (seconds)
- Other Options
- Dynamic Database Connection
- Pooling

2.3.8 Strengthen password encryption

The password settings in Database Profile, Appeon Server profile, and Web server profile are encrypted and saved in the configuration file, so they are more secure.

2.4 New Features in Appeon Server

2.4.1 Support JBoss

Appeon Server can now work with JBoss application server.

2.4.2 Support 64-bit OS

Appeon Server now fully supports 64-bit operating system, and the Appeon Server setup program is provided either in 32-bit version or 64-bit version.

2.4.3 Improve licensing mechanism

The license mechanism is improved in the following aspects:

- License can be bound with the MAC address of network card or the address of main board.
- The formula to count the number of logical CPUs is configurable. In previous versions, two cores are counted as one CPU.
- License can be configured to directly use the number of physical CPUs regardless how many cores each physical CPU contains.
- More useful information is added into the license, such as detailed version information.

2.5 New Features in AEM

2.5.1 New Connection Cache properties

Several connection cache properties are added to the connection cache tool in AEM:

- Command Timeout (seconds)
- Connection Lifetime (seconds)

- Other Options
- Dynamic Database Connection
- Pooling

2.5.2 New Configuration backup tool

You can back up and restore the AEM configuration file(s) easily by using the Configuration Backup tool in AEM.

2.5.3 New Application Title setting

You can configure the text shown in the IE title bar when the Web application is run.

2.5.4 Web service DataWindow

In AEM, you can modify the Web service URL for all methods of the DataWindow object(s) or for a single method of the DataWindow object.

2.5.5 New Upgrade License button in Licensing page

You can use the Upgrade License button in the AEM Licensing page to input updated information for generating the license upgrade request, and apply the upgraded license.

2.5.6 New client settings

Three client settings are added to AEM:

IE Compatibility Settings: Appeon supports both 32-bit and 64-bit IE browsers, and will automatically call the compatible Appeon Server Web Component when a Web application runs in IE. But if the application calls OCX/DLL/OLE files, then you may want to specify the compatibility mode of the OCX/DLL/OLE files in the IE Compatibility Settings tool in AEM, so if any incompatibility between the OCX/DLL/OLE files and IE is detected, IE will prompt the user with proper message.

IE Views Settings: You can control the IE behavior by customizing the IE views in the IE Views Settings tool in AEM. You can select to display or hide the menu bar, status bar, address bar, or all of the toolbars of IE browser, and open IE in full screen mode or normal mode, when a Web application runs in IE.

Web Application Auto Update: When an Appeon Web application is run, it will compare the Web files on the client with the files on the server, if there are updated files on the server, it will download the files to the client if auto update is set to Yes, and will not download the files if it is set to No.

2.6 New Features in Appeon Server Web Component

2.6.1 Supports 64-bit OS

Appeon Server Web Component now fully supports 64-bit operating system. When a Web application runs in IE browser, it will automatically call the compatible Appeon Server Web Component. In previous versions, it only supports 32-bit operating system.

2.6.2 Supports IE 8

Appeon Server Web Component supports IE 8. If you are using IE 8 under Windows Vista, 2008 or 7, you will not need administrator privilege to download and install Appeon ActiveX control.

2.6.3 Appeon Performance Analyzer

Appeon Performance Analyzer is a tool to help diagnose application performance by analyzing script calls, application RPC calls, application errors and application downloads, and thereby calculate the time used by function calls or object calls.

2.6.4 Auto-block system error messages

Some system prompts or errors that do not affect the running of Web applications, such as “The script on this page is causing Internet Explorer to run slowly”, “Stack over flow”, etc. are automatically blocked by Appeon.

2.6.5 Support QTP

In addition to LoadRunner, another stress test tool QTP is now also supported by Appeon.

2.7 New Features in Appeon Workarounds PBL

- AppeonWebServiceComponent object is a non-autoinstantiated NVO Appeon provides as the proxy object to call Web services.
- AppeonPrint2File function is added to save the specified DataWindow as PDF files or image files of BMP, JPG or GIF format.
- AppeonGetRemainingdays function is added to get the remaining day(s) of license or technical support.

Index

A

About This Book, 1
Appeon PDFPrinter setup program is removed, 5
Appeon Performance Analyzer, 8
Appeon Server supports 64-bit OS, 6
Appeon Server Web Component supports 64-bit OS, 7
Application Profile Name in Application Deployment Package is modifiable, 5
audience, 1
Auto-block system error messages, 8

E

Exporting/Importing an application profile, 5

H

how to use this book, 1

I

if you need help, 2
Improve licensing mechanism, 6
Improve the system database, 5
install Appeon Server to multiple Application Servers on the same computer, 4

N

New Application Title setting, 7
New client settings, 7
New Configuration backup tool, 7

New connection cache properties, 6
New Connection Cache properties, 6
New Features in AEM, 6
New Features in Appeon Developer, 5
New Features in Appeon installation, 3
New Features in Appeon Server, 6
New Features in Appeon Server Web Component, 7
New Features in Appeon Workarounds PBL, 8
New performance settings, 5
New Upgrade License button in Licensing page, 7

P

PB 12 Classic support, 5

R

readers, 1
related documents, 1

S

Selectable compression method for JBoss, WebSphere, or WebLogic Web server, 5
Strengthen password encryption, 6
Summary view of application profile configurations, 5
Support IE 8, 8
Support QTP, 8

W

Web service DataWindow, 7