

ProductXpress

Release Notes

ProductXpress Calculator and Designer v3.7.2

February 2015

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Introduction

This document contains product release information for ProductXpress Designer v3.7.2 and Calculator v3.7.2. For full installation instructions, refer to the relevant *Installation Guides*, which are provided in PDF format and are located in the Documentation folder on each product disk.

For full instructions on using ProductXpress Designer and the Calculator Management Console refer to the Online Help, which can be accessed directly from each application. In addition, integration-related information and related sample code are available in the Calculator guides that are also accessible on the Calculator Web Portal.

What's New in ProductXpress v3.7.2

ProductXpress v3.7.2 is a service release for Designer and Calculator comprising of defect fixes, enhancements and some performance improvements.

For more details regarding defect fixes in specific product areas, please contact Product Support (on page 23).

Defect Fixes

Product	Area	Defect Fix	Associated PCR
All	Calculations	In certain circumstances, when using a static deployment, a problem occurs during optimization of function variable and operation calls, causing an error (issue 12312)	
Calculator	Calculator console login	Calculator Console, when connecting to multiple Calculators (with different logins) is able to switch user more easily (issue 12065)	
	Transform	messageName and messageNavigationName are now exposed on the Transform interface (issue 11990)	
	Transform	Improved handling of multi-threaded transform calls (issue 12172)	

Implemented Enhancements

- Building on the existing Transform and Calculate abilities, Calculator can now execute a pipeline when a new service called 'execute' is invoked. Pipelines provide the ability to perform complex integrations with Calculator, without needing to write glue-code in the application (or middleware) that is calling Calculator. Pipelines are XML processing scripts that allow transformation, calculation, concatenation, and enrichment of data.
- Pipelines are defined in PxProc, which is an XML pipeline language inspired by XProc.
- ▶ A PxProc pipeline is used to specify the sequence of operations to be performed on a request to the Calculator.
- Pipelines are made up of simple steps that perform atomic operations on XML documents and constructs similar to conditionals, iteration, and exception handlers, which control which steps are executed.

What's New in ProductXpress v3.7.1

Defect Fixes

Product	Area	Defect Fix	Associated PCR
All	Documentation	Minor documentation fixes and improvements.	
Designer	Delegate	Problems loading deployment into remote dscalc. (Issue 11839).	
	Deployment	Encrypted package cannot be deployed. (Issue 11756)	58413
	Find	Find on the whole repository can give back a different sub-set of the whole repository than a find on a deliverable and its used deliverables. (Issue 11586)	
	Output Aggregation	Calculation wants to aggregate over non-aggregation link. (Issue 11783)	
	Portfolio Analysis Tool	Portfolio Analysis Tool has issues if output file for Intermediate XML output does not exist. (Issue 11834)	
		Portfolio Analysis Tool silently exits if bin size is zero. (Issue 11833)	
	Publishing	XIDE Exception occurs when Publishing a certain model. (Issue 11769)	59061
	Publishing Coordinator	Publishing tries to open reqclc file when generating PFAnalyze files. (Issue 11831)	
	Replicate	Multiple fixes applied to the product area Replicate. If you require details of these fixes, please contact Product Support (on page 23).	
	Testlab	Test lab no longer recognizes multiple value-source option after update snapshot. (Issue 11778)	
		Import of particular Calculator Input results in multiple occurrences of certain instances in the output. (Issue 11698)	
		Ext-id present in Calculator input xml results in incorrect import in Test lab.	

Product	Area	Defect Fix	Associated PCR
		(Issue 11696)	
		A certain test case returns no calculation results. (Issue 11512)	
	Testset Editor	External table calculation problem, which worked in previous versions of Designer. (Issue 11759)	58773
	Validate	Validate on a certain deliverable has different result in v3.7 and v3.5.1. (Issue 11494)	57968
	Version Management	Reference to null error upon revert after double move. (Issue 11517)	
Calculator	XSD	Names of parameters sometimes do not show up in XSD. (Issue 11469)	
	Aggregation	When doing a certain aggregation, pxtest performance is as expected when aggregating across a set of three files, but becomes very slow as soon as a fourth file is added. (Issue 11825)	
		Standard deviation aggregation gives incorrect results when applied to data-sets larger than 2^16. (Issue 11471)	
	Calculator General	Stability issues encountered when certain Security Port Scans are run. (Issue 11889)	58468

Implemented Enhancements

- ▶ Support for right to left business content throughout Designer for languages such as Hebrew. (Issue 11844)
- Allow host name lookup to be turned off in Calculator. In some network infrastructures, performing a host lookup can be a slow action. While establishing a SOAP connection, Calculator performs a host lookup. This means that establishing SOAP connections can take a long time. A setting is now implemented allowing the lookup to be switched off. (Issue 11809)
- ➤ Small improvements in Calculator WSDLs. The improvements have been made in XmlString and Key of xslt parameters. (Issue 11485)
- In the area of Replicate, there have been a number of enhancements implemented including:
 - Update a replicated deliverable automatically, prior to checking it in. Previously, when a
 deliverable was not up to date in a replica and a user checked it in, the deliverable would

be checked in on the source, but in the replica, the checked out version would remain. Now the user interface updates the replica automatically. (Issue 11614)

- Display the user who has edited a component in replica in the source. Previously, when
 a user edited a replicated component in the replica, the version status of that
 component (version) changed to ReplicaEdited in the source. However, the user who
 made the edit was not identified. The User field identifies who has created (released)
 that version. The user is now displayed. (Issue 11608)
- The data type of XSLT parameter names in the WSDL has been changed from xsd:string to xsd:QName. This will likely impact existing code that is generated from the WSDL, such as in the C# example provided.

Documentation Amendments

The following paragraph on page 13 of the Calculator Installation Guide should be amended:

Only the creation of instances is supported, while the automated upgrade of instances is not supported. Existing instances would have to be removed and then re-created when upgrading to a newer version of Calculator.

This paragraph should read, as follows:

The upgrade of instances is now supported. Running an upgrade will also upgrade all instances. This applies to Windows platforms only.

What's New in ProductXpress v3.7

ProductXpress v3.7.1 includes some major enhancements along with other relatively smaller improvements based around the following themes:

- Expanding the functional reach of ProductXpress and applicability to newer usage areas
- Enhancing the user experience to further speed up and simplify product implementations
- ▶ Easing integration and expanding platform support
- Improving scalability and performance of ProductXpress (also for large models)
- Defect fixes for (non-critical) problems reported on older versions of ProductXpress

Highlights of the usage details for enhancements are provided in the User Guides and/or online help. Details of defect fixes and small enhancements or user interface changes are not described here – status of specific requests can be made via Product Support.

A ProductXpress Designer training course is available that can be scheduled on request via your normal HP (Sales/Account) contacts.

ProductXpress version 3.4.x has reached end of life with the release of v3.7.

As a standard practice, HP provides support for the current commercially available release and the two previous "minor" releases of the HP ProductXpress software. Therefore, as a general rule, only ProductXpress Release 3.5.x and newer versions are supported. Should you need upgrade assistance, please contact the Application Support Centre (ASCHPInsuranceServices@hp.com (mailto:ASCHPInsuranceServices@hp.com)). HP will deliver support according to the description of the offering, eligibility requirements, service limitations and customer responsibilities described in the relevant legal documents.

Expanding the functional reach of ProductXpress and applicability to newer usage areas

Expanded scalability of calculations across large volumes of data

This **major** enhancement applies to the scalability of Aggregations; as a special type of calculation, to iterate over large sets of related data that are sent to the Calculator in multiple requests. In ProductXpress v3.7.1, it is possible to distribute aggregation requests over multiple Calculators, on multiple machines if necessary. These volumes of data are often encountered when performing Solvency analysis, Asset Liability Management analysis or other types of portfolio level calculations that require large volumes of data with sets of inter-related calculations within a batch.

When calculating across large volumes of data, for example averages across a portfolio of assets or policies, embedded values, etc., then a calculation can be split into multiple smaller requests and distributed across multiple CPUs and machines using the ProductXpress aggregation mechanism.

Though standard aggregation functions are also provided for common actions, the new solution enables users also to model custom aggregation functions in Designer explicitly; using a special type of value source (that defines how a feature obtains its value).

This scalability is achieved through adoption of the MapReduce algorithm to enable processing of large numbers of (interdependent) calculations by a defined set of Calculators.

Enhancing the user experience to further speed up and simplify product implementations

Enabling remote work with "Replicate" and recent enhancements

The fundamentals for this major enhancement in Designer were introduced in v3.6 to meet the increasing trend of organizations working on remote infrastructures with network latency.

This "replicate" capability allows users to adopt different work processes in the case of multiple users working together on large Designer models. This is achieved by using a local replica repository, in which parts of the central repository are copied to the local machine to enable independent and offline work.

Work can be synchronized from the central repository to the local replica at user-initiated moments (meaning that users are not always influenced by the ongoing changes in the central repository).

This offers much larger scalability for large teams, because users can work in isolation of the central repository server.

There are two main modes of operation:

- Offline: in this mode, components that are edited by a user in the local replica are not locked on the central server
- Connected: in this mode, components that are edited by a user in the local replica are also locked on the central server, so that other users do not accidentally work on the same component

Once an offline user becomes connected, Designer will automatically lock any components that were edited offline (as much as possible). Merge facilities are available to resolve conflicts if and when they arise.

The v3.7.1 version introduces:

- Multiple enhancements for improved robustness and performance.
- ▶ Enables large team developments in which changes made by a team member can be moved from one deliverable version to another deliverable version, for example to support multiple development streams.
- Allows users to perform maintenance of local repositories from Designer.
- (i) When using the Replicate capability, the local replica can grow significantly depending on the size of the contents that you replicate from the source repository. Ensure that sufficient local disk space is available.

Enhanced Testlab intermediate results

Testlab intermediate results are significantly improved, particularly for calculations on structure. The intermediate results viewer includes enhancements such as:

• Detailed traceability for path expressions, anchored paths and function variables to more easily understand the way that calculations are performed in different parts of a structure.

- Removal from the result tree of some intermediate result nodes that are redundant in special, but frequently occurring circumstances (for example a path to a features in the same structure element) so that it is quicker to dig into the intermediate results.
- Detailed intermediate results of a local/regular variable set by 'let' and also by multiple nested lets in a single expression to more easily understand all the steps in such complex calculations.

Design Environment Improvements

Several improvements and changes to Designer (mostly with respect to the user interface) have been included in this release, some in response to user community requests. These include:

Designer date settings

Designer IDE Tools->Options such as "firstdayofweek" and "firstweekofyear" settings will be preserved across Designer versions (PCR 54534).

Input mapping

Prior to this release, it was possible to "map on constant" and "map to NULL" for variables of a simple data-type. These input mapping possibilities are expanded to include complex data-types such as sets and tuples.

In addition, Validate is extended with warnings to prevent users from creating mappings on a variable when this is mapped in a super-type or composition.

Diagram Editor

This enhancement in the Structure editor allows users to take a complement part as partition of a partition part.

Improved Usage and History Viewers

Both of these capabilities are significantly enhanced for improved visibility and usage of mappings, features, complete history for indirect common ancestors not present in repository (PCR 53884).

It is now possible to hide certain types of components from the diagram to make the diagram more easily readable. Additionally, when for example, a variable is used by a mapping in a structure element, both the mapping and the structure element are always shown automatically.

The style of the usage diagram has also been changed to improve legibility.

Dependency Viewer

The Deliverable Dependency Viewer is modified for improved legibility. When using the "check out dependency tree" on the main deliverable, the tree now shows the results of the checking out, rather than the original deliverable. This allows the newly created deliverables to be immediately usable.

Validate

The validate function now allows the user to select a subset of validations that needs to take place. This allows you to specify a particular type of modelling issue in your search, such as: to find only dangling references, or to find only unused mappings, without having to check all possible modelling issues. This yields a smaller result set and a quicker turnaround time. This action can now also be invoked from the task pane.

Deployment Editor

The Deployment editor is enhanced with a new context menu item to "remove invalid mappings", which removes mappings of deleted attributes and can save time in projects.

Textblock editor and Textblock publishing

The best practice for users is to document algorithms and technical model details in Textblocks with the hyper-links; therefore incorporating the appropriate level of relevant information. The Designer reporting capability is now enhanced to incorporate publishing of textblocks and its hyper-linked components by means of a separate dedicated template (PCR 44311).

In addition, the Textblock editor process to create links to components in Textblocks is significantly simplified via the context menu, with fewer user actions required which makes it less prone to user errors.

Path editor

Expressions containing path-expressions can sometimes become hard to read due to long paths, so support for this has been improved. When placing a cursor behind the path or selecting it, the properties pane now displays the properties of the target, namely wherever the path ends. It is also possible to switch the view mode to display the path in short form or the full path via the toggle in the context menu.

Find dialog

The Find dialog is enhanced to incorporate the history of searched terms and to find dangling references. The types of components are expanded for "Find unused" (value definitions, tables, etc.) to improve user productivity.

Other general enhancements

Additional built-in functions

Two new functions are added to the existing library of built-in functions:

- Total: Function "Total(set_A)" is introduced, which directly calculates the total of a set of reals or integers; as a shorter notation for condsum
- Condmean: This function allows you to quickly calculate the average across a set. It works like "condsum divided by set cardinality" with an error if the set cardinality is zero.

Deployment time information to deployed external table file

To improve traceability for external tables, the deployed external table file is supplemented with the date-time when it was deployed. This information is visible via the normal tools like logs, tableImp - list and Calculator Console.

Settings for "decimal" and "thousand" separators

To enhance robustness and decrease sensitivity of user/system locales, the TableDataCSVLoader.Settings file is enhanced with explicit options for "decimal" and "thousand" separators.

Renewed example products

The UK pension example product has been updated to showcase the modeling capabilities of inheritance. The product now consists of a framework from which a Single and a Regular Premium product are derived.

In addition, the Mortgage Insurance example product has been updated to demonstrate the new output aggregation capability. The analysis of the portfolio of homes is now carried out via output aggregation. Enhancements have been made to make the simulation approach clearer, more consistent and scalable with the size of the simulation run.

Easing integration and expanding platform support

Changes to supported platforms and infrastructure

ProductXpress is now certified on Windows 8 and Windows Server 2012 platforms, as indicated in the Certification Matrix guide. In addition, the Designer repository can now also be hosted on the Microsoft SQL Server 2012 DBMS.

From this version onwards, general support is dropped for older platforms such as Windows XP and Windows Server 2003.

Calculator related changes

- ▶ SOAP HTTP Response Header: The Calculator has now implemented the CORS http-extension (Cross-Origin Resource Sharing http://www.w3.org/TR/cors/). When an Origin header is received in a SOAP request to the Calculator, it will respond with an Access-Control-Allow-Origin header with value '*' as per the protocol specifications (PCR 56178).
- Real precision setting: The RealPrecision setting within the Calculator.settings file is now also available for the Embedded Calculator (PCR: 55801).
- ▶ Stricter checking on input: The Calculator input XML format (clcin) will enforce stricter checking and consistently generate an error in case of empty values for specified features. When a value element has to truly have no value or default should be used, this value is specified explicitly as xsi:nil="true".
- CalcClientCOM interface: The "transform-calculate-transform" interface for CalcClientCOM has been enhanced to directly return an array of bytes.

Calculator Console enhancements

The Calculator Console is modified to improve the user experience as follows:

- ► The log-on credentials per connected Calculator are retained per session, making it easier to switch between Calculators.
- Similar to the ability to add configuration items to multiple Calculators, the Console can now remove existing configuration items from multiple Calculators.
- ▶ The dialogue to add a new Calculator is simplified for entering "Name" and Host" fields.

Improving the scalability and performance of ProductXpress

This covers both technical and functional improvements in ProductXpress, particularly for handling and working with large (Designer) models.

Improved Calculator performance

Calculator performance is improved significantly for up to 30% for specific types of model patterns.

- This particularly applies to models that use operations that reference each other frequently, for example when performing a recursive calculation.
- In addition, the performance of certain types of set manipulation is improved.

Improved Designer performance

Multiple long lasting actions

The performance on large models of long-lasting actions like Validate and the creation of a deployment package has been improved, particularly for circumstances in which the repository is 'cold', namely just after it has been restarted.

Re-opening editors

Re-opening of editors is faster. For example, navigating from component usage to an already open input mapping screen.

Run-time publishing improvements

There is improved responsiveness for Testcase publishing, which now includes operation parameter values and enhanced legibility of instance references including names of structure elements.

Notes on Upgrade and Conversion

This section provides various notes regarding previous releases.

Upgrading from Calculator v3.5.x or v3.6

The Windows version of this release can be directly upgraded from release versions of Calculator 3.5.x or 3.6 using the automated installer. For upgrade information on UNIX platforms, refer to the Readme issued with the 3.7 UNIX versions.

(i) As a trade off for Calculator performance onwards from v3.5, it is no longer possible for "reals" to set a higher precision than 16, and higher settings are ignored. The default precision of 14 remains unchanged.

Upgrading from pre Calculator 3.5.x versions

For the Windows version, please upgrade to Calculator v3.5.x prior to performing the v3.7.2 upgrade as described above. For upgrade information on UNIX platforms, please refer to the Readme issued with the 3.7.2 UNIX versions.

Customers with very old versions could also consider a fresh Calculator 3.7 installation instead of sequential upgrades of newer versions of Calculator. Afterwards, the 3.x deployment packages can be re-deployed into v3.7.

Upgrading from Designer v3.5.x or v3.6

This release can only be upgraded from release versions of Designer 3.5.x or 3.6. Before upgrading to v3.7.2 from one of the above versions, you must first make sure that the following is met:

- All components that are currently in edit mode are released.
- No deliverables are in version conflict.
- For an upgrade of the repository from Designer v3.5.x or v3.6 to Designer v3.7.2, there must be a certain amount of free space on the disk drive where the SQL Server data files are located. The required amount of free disk space is equal to at least 2-3 times the size of the (e.g. SQL Server) data file (with mdf extension) that contains the Designer repository (e.g. "Designer3.mdf", if the name of the database is "Designer3").

For the dump file that is temporarily created during the database upgrade, the free disk space must be around 0.5 times the size of the (e.g. SQL Server) data file that contains the Designer repository. This free disk space must be available on the disk drive where Designer is installed. However, if a non-default temp folder is indicated with the "-tmpdir" command line option of the upgrade tool "C237.exe", this free disk space must be available on the disk drive of the temp folder.

Upgrading from Designer v3.5.x or v3.6 to Designer v3.7.2 is fully automated via the install and the associated conversion/upgrade of the repository. Furthermore, you may import Designer v3.x deliverables into a Designer v3.7.2 repository. Note that if the ExternalFunction.Settings, FPMServer.Settings and ServerURLs.Settings files (located in <InstallDir>\Etc) were changed in an earlier version, then these user changes will remain effective after the upgrade to Designer v3.7.2.

If you want to start with default values for the above mentioned settings files, you must delete them before upgrading to Designer v3.7.2.

Upgrading from pre Designer 3.5.x versions

An upgrade to a version of Designer 3.5.x is required before performing the v3.7.2 upgrade as described above. Note that with the release of this version 3.7.2, general support will only be provided for v3.5 and later, so a timely upgrade is recommended.

Upgrading from Designer v2.4.x

ProductXpress version 2.4.x is not supported onwards from June 2009. Please upgrade to Designer v3.2.3, and then to Designer v3.3.1, v3.4.x, v3.5.x and finally to Designer v3.7.2.

(i) Contact productxpress.support@hp.com (<u>mailto:productxpress.support@hp.com</u>) for questions or tips for the upgrade to ProductXpress v3.7.2.

General Installation Notes

- Refer to the relevant installation guides for Designer and Calculator.
- Firewall Software: If you use firewall software on your local system (Personal Firewall / Desktop Firewall), disable its policy before installing Designer. Firewall software may interfere with the application, since Designer uses TCP/IP network connections. Potentially, this can cause significant performance degradation during normal operational use of Designer and its connection to the (remote) database system.
- Multi Language Support: Designer supports the input, display, and output of Unicode-supported data related to specific locales. This results in this user defined data being handled in locale-authentic formatting of numbers, date, time, currency values throughout the various editors. For further information about changing your regional options or input locale, refer to the Microsoft Windows online help.
- ProductXpress Designer v3.7.2 runs as a time-limited trial evaluation version for 30 days from installation. To evaluate ProductXpress Designer, click Continue in the license check dialog box.
- Contact ASCHPInsuranceServices@hp.com (mailto:ASCHPInsuranceServices@hp.com) for enquiries about purchasing ProductXpress Designer v3.7.2 or obtaining license if you are already a customer. Follow the instructions in the Designer Installation Guide for activating the license key.
- ➤ To remove an installation on Windows: uninstall the Designer v3.7.2 and Calculator v3.7.2 installation using "Add/Remove Programs" on XP or "Programs and Features" on Vista/Windows 7 within the Control Panel. Note that External Function. Settings, FPMServer. Settings & ServerURLs. Settings files (located in <Installdir>\Etc) will not be deleted during the uninstall of Designer / Calculator. Also, user workspaces will not be removed during uninstall. For more information, refer to the relevant *Installation Guide*.
- In a Designer client server environment, there is no check on the version of the server by the client or vice versa; make sure that the corresponding client and server are always installed.
- Calculator requires the appropriate C++ runtime to be installed on the target platform. For Windows, the Microsoft Visual C++ 2008 runtime is installed when using the installer complete install. For an unattended install, refer to the section "Installing the prerequisites" in the Unattended Installation section of the ProductXpress Calculator v3.7.2 Installation Guide. If the Calculator is embedded within another application, Microsoft Visual C++ 2008 runtime can be downloaded from Microsoft and must be installed. For AIX, IBM XLC/C++ for AIX V10.1 runtime must be installed.

Example Insurance Products

A number of example insurance products are included with ProductXpress Designer v3.7.2. These products demonstrate how Designer can be used to create financial products in multiple lines of business and/or applicability in different business areas. These products and their documentation can be accessed from the start page of Designer by clicking the 'Example Insurance Products' link.

The following example products are available:

Profit Test Framework & Simple Profit Demo	Demonstrates how ProductXpress Designer facilitates profit test calculations.
Variable Annuity	Demonstrates how ProductXpress can be used to create annuity products. Furthermore, you can use this product as an example for viewing calculation results in charts.
Variable Universal Life	Demonstrates how Designer can be used to create VUL products and how these products may be deployed
Car Insurance	Demonstrates how Designer can be used to create car insurance products (P&C line of business).
HMO Manual Premium	Demonstrates an example of a "first principles" manual rate development (Health line of business).
Deposit Processing	Demonstrates advanced capabilities of ProductXpress using multi-currencies, sets, quantities and external tables.
Mortgage Insurance Default Probabilities (Risk)	Demonstrates usage of ProductXpress to assess and analyze product risk; and uses the library of statistical and stochastic functions.
	Modified in v3.7 to demonstrate the newly introduced output aggregation capability.
UK Pension Product	Demonstrates usage of ProductXpress to model a comprehensive Pension Product, which also contains the ability to generate on-line quotes using the run-time publishing capability of ProductXpress.
	Expanded in v3.7 to demonstrate the inheritance capability of ProductXpress.

Known Issues

The main known issues are provided below:

Calculator Console

 Cannot deploy a very large external table to an remote Calculator using the Console due to excessive XML memory used by Java/SOAP (Issue 8561).

Designer Installer

- During an upgrade, due to a limitation of a 3rd party component, if the length of the contents of the path environment variable is greater than 1024 characters, it is sometimes not possible for the installer to find the Microsoft SQL Server installation. To resolve this issue, move the location of the Microsoft SQL Server installation to the beginning of the environment variable.
- If applicable, the Designer executable "xidenet.exe" should not be subject to DEP (Data Execution Prevention). DEP configuration can be checked and changed through the Control Panel, item "System", tab "Advanced", button "Settings" in section "Performance", tab "Data Execution Prevention". If DEP is turned on, in this screen add "xidenet.exe" to the list of programs that are exempt from DEP. Xide.exe can be found in the "Common\Xide\Bin" subfolder of the <ProductXpress> installation folder. Unless changed during installation, the default ProductXpress installation folder is "C:\Program Files\Hewlett-Packard\ProductXpress\".

Publishing

 Calculation results with request parameters in Testlab are not published properly to Excel and PDF.

Testlab editor

- Instances references in Testlab expected results cannot be edited.
- In general, Designer stops responding when you right click on value editors after displaying a chart particularly on 64-bit Windows 7. For example: after a chart is shown, right clicking on a feature value in order to show a popup menu causes Designer to stop responding. Right clicking next to the value does not cause this problem.
- Using Shift-F10 (a Windows default key combination) to show a popup menu causes Designer to stop responding when inside a value. The special windows 'popup menu key' always works however (Issues 8650, 8655, 8497).

Hints & Tips

Security for Calculator (Web) Console

User Account Control (UAC) policies on newer Windows platforms and/or your organizational security policy may mean that many actions within the Calculator Console can only run in elevated mode with administrator privileges. In this situation, invoke the Calculator Console application using the "Run as Administrator" option.

Also, user credentials are required for running the Calculator Web Console from the Calculator Web Portal. Administrators with appropriate privileges need to create user profiles for authorized users. When no users have been set up yet, this can be done within the (non Web) Calculator Console.

Replicating large source repositories

When using the Replicate capability with Designer, note that local replica can grow significantly depending on the size of the contents that you replicate from the source repository. Ensure that sufficient disk space is available.

Using older versions of Microsoft Word for publishing

ProductXpress now supports publishing of reports in Microsoft Word 2007 (or higher) format as well as the original PDF format. See below for using this functionality with older Word versions.

From the Microsoft site: By installing the Compatibility Pack in addition to Microsoft Office 2000, Office XP, or Office 2003, you will be able to open, edit, and save files using the file formats in newer versions of Word, Excel, and PowerPoint. The Compatibility Pack can also be used in conjunction with the Microsoft Office Word Viewer 2003, Excel Viewer 2003, and PowerPoint Viewer 2003 to view files saved in these new formats. For more information about the Compatibility Pack, see 924074 on the Microsoft site.

Behaviour of comparison to Null

The behavior of comparison to Null has changed since v3.4. This previously resulted in an error that caused users to work around this situation (via piecewise). Now it directly returns the value "False" - which is the desired functionality.

Dropping usage of IsValid

It is no longer possible to use the IsValid function. As announced with version 3.3, this is now eliminated and existing usage results in an error. As advised, users should review their calculations and replace them with alternative logic like "NOT IsNull", where applicable.

Dropping support for time dependent sets

From v3.7 onwards, it is no longer possible to create and subsequently use time dependent sets, which will now give a Designer error when validated. In the previous version, a warning was given to alert users. Existing models using time dependent sets can exist and be executed by Calculator – though this support is likely to change in future versions.

Deployment creation date

The default activation date for a deployment package during deployment is the creation date of the deployment deliverable and not the creation date of the deployment component. This had previously caused some confusion with users.

Sharing workspaces between computers

Sharing workspaces between two different computers is only possible if the two machines are set up in the same way (for example, the installation drive and directory for Designer must be exactly the same). If you wish to reuse workspaces between computers, please make sure this is the case.

Memory issues with large reports

If you run into memory issues while running reports for large products or testcases (with extensive permutations), try installing Java 1.6 (to overcome the FOP problems).

Changing report fonts for non-Latin scripts

Please refer to the document titled "Selecting a different font for Testlab or repository reports.html" in the Documentation folder of your Designer installation. This document describes how to change the fonts used for both Testlab and repository reports. For reports that use non-Latin scripts, this is a requirement, as the built-in fonts for the generated PDF do not contain characters for these scripts.

Publishing on multi-byte character Windows

In order to publish deliverables that contain multi-byte characters and/or publish with a Windows user account that contains multi-byte characters, the following option must be set in the "PublishingCoordinator.Settings" file that can be found under your Designer installation at folder location <InstallDir>\Etc.

```
<TempDir value="C:\PxTemp"/>
```

This option is set as a child of the <PublishingCoordinator> root element. The path above ("C:\PxTemp") is just an example. It can be any path as long as it does not contain any multi-byte characters.

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Product Support

If you have any questions about ProductXpress Designer or Calculator, consult the following sources first:

- Online help
- Product documentation

If you cannot find the answer here, or need further details, contact our product support:

International Customers: ASC Support	European Customers: European ProductXpress Support
Toronto, Canada	Capelle a/d IJssel, The Netherlands
9:00 am - 5:00 pm EST	9:00 am - 5:00 pm CET
Toll-Free 1-888-765-2677	+31 (0)10 3006588
+1 (905) 206-4400	e-mail: productxpress.support@hp.com
e-mail: ASCHPInsuranceServices@hp.com (<u>mailto:ASCHPInsuranceServices@hp.com</u>)	(mailto:productxpress.support@hp.com)