

SMARTBIM

SMARTBIM Library Manager

[SMARTBIM Library Manager Help](#)

SMARTBIM QTO Cost Check

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[Frequently Asked Questions](#)

SMARTBIM Frequently Asked Questions

Related Help Topics

- [SMARTBIM Library Manager Help](#)
- [SMARTBIM QTO Cost CheckHelp](#)

Frequently Asked Questions:

Question 1 What is the difference between Standard Publishing and Rapid Publishing?

Answer 1 Setting permissions on shared folders allows system administrators to open folders in **SMARTBIM Library Manager** across the LAN, inspect and evaluate new families, and copy new families from the end-user's 'scratch pad' catalogs to the office catalog on the shared drive. It is recommended that you set permissions on shared folders from the administrator computer.

Note: For catalogs that project team members create on desktop machines that are connected to a LAN, set user-defined catalog folders to **Shared Folders**.

Standard Publishing Mode:	Rapid Publishing Mode:
More complete data set with DWF included, but can be time consuming for large collections of Revit families.	Faster than standard publish mode, but does not include the DWF. In some cases it extracts only a subset of the parameters that are extracted by Standard mode
Standard publishing mode extracts the following assets from a family for representation in Library Manager: <ul style="list-style-type: none"> • Category, family name, and type names • Type parameter names and values • Instance parameter names and default values when available • Type catalog data when available • Thumbnail image of family • DWF model of family 	Rapid publishing mode extracts the following assets from a family for representation in Library Manager: <ul style="list-style-type: none"> • Category, family name, and type names • Type parameter names and values • Instance parameter names and default values when available • Type catalog data when available • Thumbnail image of family

Question 2 Should I upgrade to the new software?

Answer 2 Yes, it is recommended that you upgrade to the latest version of the SMARTBIM software.

Question 3 Will the new SMARTBIM Suite Installer for Revit 2011 replace my current SMARTBIM software for 2011?

Answer 3 Yes, it will replace the software.

Question 4 Will the new SMARTBIM Suite Installer for Revit 2012 replace my current SMARTBIM software for 2012?

Answer 4 Yes, it will replace the software.

Question 5 Will the new SMARTBIM Suite Installer for Revit 2012 replace my current SMARTBIM software for 2011 or earlier?

Answer 5 No, it will not replace earlier versions.

Question 6 Will I need a new license activation key to use the Suite?

Answer 6 Yes, your new activation key is included at the beginning of this e-mail.

Question 7 Is there a separate installer for Library Manager and QTO Cost Check?

Answer 7 No, the new Suite installer for Library Manager 4.2 and QTO Cost Check 2.2 will automatically install both software packages. There is no extra charge for getting QTO Cost Check 2.2.

Question 8 Do all the license keys transfer automatically, network and desktop?

Answer 8 You are being given the new license key to activate the new Suite software. See the beginning of this e-mail.

Question 9 Will I have to download the new re-branded SMARTBIM Object Catalog or can I keep my existing?

Answer 9 You can choose to use the existing SMARTBIM Object Catalog or download SMARTBIM branded families that replace their Reed Construction Data branded content. When you download SMARTBIM branded content, Library Manager 4.2 will swap existing Reed Construction Data families for the same content that has been re-branded for SMARTBIM. The Content Update Service will allow you to perform this update incrementally, since updating all families at one time can be time consuming. Users of SMARTBIM Library 4.0 can continue to use the Reed Branded content they have downloaded; however they will not receive new content through the Content Update Service.

Question 10 How do I get the most recent content?

Answer 10 You will get the most current content by using the SMARTBIM Suite which includes Library Manager 4.2 and QTO Cost Check 2.2 and users of Library Manger 4.1 will also continue to get current content updates. These updates are included with the service. Customers without one of these releases will not continue to get new content through the content update service.

Question 11 Will the new Suite have 1 installer and 1 license activation code for both products?

Answer 11 The SMARTBIM Suite has 1 installer and one license activation code that will both install and activate the Library Manager and QTO Cost Check products.

Question 12 The DWF view is showing the back of the object when using Revit 2012?. Why is this happening?

Answer 12 This is a known issue with the free software Autodesk Design Review 2012 (ADR 2012) which is packaged with Autodesk Revit 2012. The workaround is to uninstall ADR 2012 and install/reinstall ADR 2011. See here for downloading the [ADR 2011 installer](#).

Building Intelligence

SMARTBIM

[SMARTBIM Library Manager Online Help](#) [Home](#)

SMARTBIM Library Manager

SMARTBIM Library Manager Online Help

Help Contents

- [Welcome to SMARTBIM Library Manager Online Help](#)
- [Getting Started](#)
- [Using SMARTBIM Library Manager](#)
- [Publishing catalogs](#)
- [Downloading content updates](#)
- [Contacting SMARTBIM Library Manager Customer Care](#)
- [Frequently Asked Questions](#)

SMARTBIM Library Manager

Welcome to SMARTBIM Library Manager Online Help

Related Help Topics

[Welcome to SMARTBIM Library Manager Online Help](#)

[Getting started](#)

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Help Topics Available

- [SMARTBIM Library Manager Overview](#)
- [Using SMARTBIM Library Manager Online Help](#)

SMARTBIM Library Manager

Overview

Related Help Topics

[Welcome to SMARTBIM Library Manager](#)

[Using SMARTBIM Library Manager Online Help](#)

Welcome to **SMARTBIM Library Manager**, a dynamic, flexible tool that extends the capabilities of Autodesk Revit™, providing management of both generic and manufacturer specific Revit Families.

SMARTBIM Library Manager lets you open, view, and filter Revit families from multiple catalogs. You can create your own catalogs for specialized purposes, such as evaluating untested objects and grouping approved objects. **SMARTBIM Library Manager** lets you verify the details of each object before inserting them into a project.

SMARTBIM Library Manager is always up to date with the latest family content distributed by SMARTBIM LLC. **SMARTBIM Library Manager** automatically checks for content updates each time you start the application. You can choose the updates you download to the SMARTBIM Catalog.

Note: Licensed users automatically receive **SMARTBIM Library Manager** updates. If you are using a demonstration version of **SMARTBIM Library Manager**, you must purchase a license before you are eligible for updates. For more information and help registering your copy of **SMARTBIM Library Manager**, contact [SMARTBIM Library Manager Customer Care](#)

SMARTBIM Library Manager

Using SMARTBIM Library Online Help

Related Help Topics

[Welcome to SMARTBIM Library Manager](#)

[Using SMARTBIM Library Online Help](#)

The **SMARTBIM Library Manager** Online Help provides you with detailed information and tips for using product features and functions. If you have any issues or questions that are not resolved using these Help pages, contact [SMARTBIM Customer Support](#) for more information.

To use **SMARTBIM Library Manager** Online Help,

- Click any of the links below the headings *Related Help Topics*, *Help Contents*, or *Help Topics Available*:

[SMARTBIM Library Manager Online Help](#) ▶ [Using SMARTBIM Library Manager](#)

SMARTBIM Library Manager

Using SMARTBIM Library Manager

Related Help Topics	Help Contents
Welcome to SMARTBIM Library Manager Online Help	<ul style="list-style-type: none">• User Interface Overview
Getting started	<ul style="list-style-type: none">• File, Window, and Help menus
Using SMARTBIM Library Manager	<ul style="list-style-type: none">• Working with panes
Publishing catalogs	<ul style="list-style-type: none">• Working with catalogs
Downloading content updates	<ul style="list-style-type: none">• Working with families
Contacting SMARTBIM Library Manager Customer Care	<ul style="list-style-type: none">• Searching in SMARTBIM Library Manager• Working with references• Working with tags

- Use the breadcrumb links at the top of the page to navigate back to a previous level of the Help menu, including the top level heading:

[SMARTBIM Library Manager Online Help](#) ▶ [Using SMARTBIM Library Manager](#)

SMARTBIM Library Manager

Using SMARTBIM Library Manager

Related Help Topics	Help Contents
Welcome to SMARTBIM Library Manager Online Help	<ul style="list-style-type: none">• User Interface Overview
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Downloading content updates	<ul style="list-style-type: none">• Working with families
Contacting SMARTBIM Library Manager Customer Care	<ul style="list-style-type: none">• Searching in SMARTBIM Library Manager• Working with references• Working with tags

Click on a breadcrumb link to return to a previous menu

SMARTBIM Library Manager

Getting started

Related Help Topics

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Help Topics Available

- [Downloading the Installer](#)
- [System software and hardware requirements](#)
- [Disabling Vista and Windows 7 UAC controls](#)
- [Single Seat Installation](#)
- [Multiple Seat Installation](#)
- [Network License Setup](#)
- [Activating SMARTBIM Library Manager and contacting your reseller](#)
- [Troubleshooting installations on 64-bit systems](#)
- [Known issues in this release](#)
- [Ending support for Revit 2009](#)

SMARTBIM

Downloading Installer for SMARTBIM Suite 4.2

Related Help Topics

[Downloading the Installer](#)

[System software and hardware requirements](#)

[Disabling Vista and Windows 7 UAC controls](#)

[Single Seat Installation](#)

[Multiple Seat Installation](#)

[Network License Setup](#)

This section provides information for downloading the **SMARTBIM Suite 4.2** installer, which includes **SMARTBIM Library Manager** and **SMARTBIM QTO Cost Check** software for use on both 32 and 64-bit systems.

Downloading the Installer

To download the **SMARTBIM Suite 4.2** installer for single seat use,

- 1 Verify that your computer meets the [minimum system requirements](#).
- 2 For Vista and Windows 7 users, make sure you have performed the steps in [Disabling Vista and Windows 7 User Account Controls \(UAC\) controls](#).
- 3 When you purchase **SMARTBIM Suite 4.2** from your value added reseller, you receive an order confirmation email. The email message will include a link to the installer download page on the SMARTBIM web site. Click on the link entitled: "Click here to download SMARTBIM Library Manager or SMARTBIM QTO Cost Check."
- 4 Select the SMARTBIM application Installer download link for the version of Revit that you want to install. You can select the download link for one or both versions of Revit. Your application license key will work for both. To download the installer, select the **Click here link**.

SMARTBIM APPLICATION DOWNLOADS

Free 30-day trial versions of **SMARTBIM Library Manager** and **SMARTBIM QTO Cost Check** are available through the links below. Please select either Revit® 2011 or Revit® 2012 trial versions.

For your convenience, both SMARTBIM Library Manager and SMARTBIM QTO Cost Check trial versions are packaged as a software suite and the installer will install both applications.

Current Versions:
SMARTBIM Library Manager - 4.2
SMARTBIM QTO Cost Check- 2.2

SMARTBIM Suite for **Revit 2012** - [Click here](#)

SMARTBIM Suite for **Revit 2011** - [Click here](#)

SMARTBIM Library & SMARTBIM QTO for **Revit 2010** - [Click here](#)

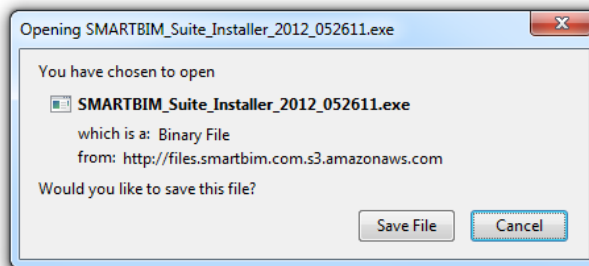
Network License Installer - [Click here](#)

SMARTBIM Library and SMARTBIM QTO for **Revit 2009** - [Click here](#)

Note: The SMARTBIM Library Manager trial version contains example model content only. A fully licensed copy has over 35,000 family types, and receives new content via our update service when released.

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Click 'Save' in response to the Installer download message.



- 5 After the installer downloads, you can move it to a folder of your choice. Double-click the installer to launch the installation program and follow the instructions to install **SMARTBIM Suite 4.2**.

SMARTBIM Library Manager

System software and hardware requirements

Related Help Topics

- System software and hardware requirements
- Disabling Vista and Windows 7 UAC controls
- Single Seat Installation
- Multiple Seat Installation
- Network License Setup
- Activating SMARTBIM Library Manager and contacting your reseller
- Troubleshooting installations on 64-bit systems
- Contacting SMARTBIM Library Manager Customer Care
- Known issues in this release
- Ending support for Revit 2009

Your system must meet specific minimum software and hardware requirements in order to use *Autodesk® Revit 2011* or *Revit 2012* with **SMARTBIM Library Manager**. Use this section to download the required version and updates for *Revit* and to verify that your PC meets the necessary requirements for using *Revit* with **SMARTBIM Library Manager**.

This section contains the following topics:

- [Autodesk Revit 2011 and 2012](#)
- [System-specific minimum software and hardware requirements](#)

Autodesk Revit 2011 and 2012

You must have the correct *Revit* software installed on your computer in order to use *Revit 2011* or *Revit 2012* with **SMARTBIM Library Manager**. Click on the links below to open a window where you can download the required software and to access important software update packs:

Autodesk Revit 2012

- [Autodesk Revit Architecture 2012 Services & Support](#)
- [Autodesk Revit MEP 2012 Services & Support](#)
- [Autodesk Revit Structure 2012 Services & Support](#)

Autodesk Revit 2011

- [Autodesk Revit Architecture 2011 Services & Support](#)
- [Autodesk Revit MEP 2011 Services & Support](#)
- [Autodesk Revit Structure 2011 Services & Support](#)

System-specific minimum software and hardware requirements

Your system must meet one of the following minimum software and hardware requirements for using *Revit* with **SMARTBIM Library Manager**.

- [32-bit Microsoft® Windows Vista® SP1, including Ultimate, Business, or Home Premium edition, or Microsoft Windows XP SP1 or SP2](#)
- [32-bit Windows XP Professional SP2 or later](#)
- [64-bit Windows Vista SP1, including Ultimate, Business, or Home Premium edition, or Windows XP Professional SP1 x64 edition](#)
- [Windows XP Professional x64 edition SP1 or later](#)
- [32-bit / 64-bit Windows 7 Enterprise](#)

32-bit Microsoft® Windows Vista® SP1, including Ultimate, Business, or Home Premium edition, or Microsoft Windows XP SP1 or SP2

- Intel® Pentium® 4 1.4 GHz or equivalent AMD® processor
- 3 GB RAM (1 GB RAM if no rendering is required)
- 5 GB free disk space
- 1280 x 1024 monitor and display adapter capable of 24-bit color
- Internet Explorer® 7.0
- Microsoft Mouse-compliant pointing device
- Internet connection
- Autodesk Design Review 2010 and/or 2011
- JRE 1.6 or higher

32-bit Windows XP Professional SP2 or later

- Intel Core™2 Duo 2.4 GHz or equivalent AMD processor
- 4 GB RAM
- 5 GB free disk space
- Dedicated video card with hardware support for Microsoft DirectX® 9 (or later)
- Internet Explorer 7.0
- Two-button mouse with scroll wheel
- Internet connection
- Autodesk Design Review 2010 and/or 2011
- JRE 1.6 or higher

64-bit Windows Vista SP1, including Ultimate, Business, or Home Premium edition, or Windows XP Professional SP1 x64 edition

- Pentium 4 1.4 GHz or equivalent AMD processor
- 3 GB RAM
- 5 GB free disk space
- 1280 x 1024 monitor and display adapter capable of 24-bit color
- Internet Explorer 7.0
- Microsoft Mouse-compliant pointing device
- Internet connection
- Autodesk Design Review 2010 and/or 2011
- JRE 1.6 or higher

Windows XP Professional x64 edition SP1 or later

- Intel Core 2 Duo 2.40GHz or equivalent AMD processor
- 8 GB RAM
- 5 GB free disk space
- Dedicated video card with hardware support for DirectX 9 (or later)
- Internet Explorer 7.0
- Two-button mouse with scroll wheel
- Internet connection
- Autodesk Design Review 2010 and/or 2011
- JRE 1.6 or higher

32-bit / 64-bit Windows 7 Enterprise

- Intel Core 2 Quad 2.49 GHz
- 3.50 GB RAM
- 5 GB free disk space
- 1280 x 1024 monitor and display adapter capable of 24-bit color
- Internet Explorer 7.0
- Two-button mouse with scroll wheel
- Internet connection
- Autodesk Design Review 2010 and/or 2011
- JRE 1.6 or higher

SMARTBIM Library Manager

Disabling Vista and Windows 7 UAC controls

Related Help Topics

[System software and hardware requirements](#)

[Disabling Vista and Windows 7 UAC controls](#)

[Single Seat Installation](#)

[Multiple Seat Installation](#)

[Network License Setup](#)

[Activating SMARTBIM Library Manager and contacting your reseller](#)

[Troubleshooting installations on 64-bit systems](#)

[Contacting SMARTBIM Library Manager Customer Care](#)

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Both Microsoft Vista® and Windows® 7 operating systems automatically block user access to the account controls of these systems. In order to install **SMARTBIM Library Manager**, users running Vista and Windows 7 must disable the User Account Access (UAC) control setting in order to install **SMARTBIM Library Manager**. This section contains the steps for disabling Vista and Windows 7 UAC controls.

Note: You must have administrative access to your computer to perform the steps in this section.

To disable Vista and Windows 7 UAC controls,

- 1 From the menu bar, click **Start** and then click **Control Panel**.
Result: The *Control Panel* menu is displayed.
- 2 Depending on whether you are viewing Control Panel in *Category View* or *Classic View*, click **User Accounts**.
Result: The *User Accounts* menu is displayed.
- 3 Click **User Accounts**.
Result: The *Make Changes to your user account* menu is displayed.
- 4 For Windows 7, click **Change User Account Control settings**.
Result Windows 7: The *Turn User Account Control Settings* menu is displayed.
For Windows Vista, click **Turn User Account Control on or off**.
Result Windows Vista: The *Turn User Account Control On or Off* menu is displayed.
- 5 For Windows 7: Lower the UAC slider to *Never notify*, and click **OK**.
For Windows Vista: Clear the check for *Use User Account Control (UAC) to help protect your computer*, and click **OK**.
- 6 Is version 4.0 of **SMARTBIM Library** installed on your computer?
 - If **yes**, you must uninstall version 4.0 before you can install **SMARTBIM Library Manager** version 4.2. Continue to [step 7](#).
 - If **no**, restart your computer. Continue to [step 8](#).

Note: if **SMARTBIM Library** version 4.1 is installed on your computer you do not have to uninstall it before running the installer for **SMARTBIM Library Manager** version 4.2.
- 7 To uninstall **SMARTBIM Library** 4.0,
 - access either the uninstall shortcut or click **Add/Remove Programs** from *Control Panel*
 - follow the steps to remove **SMARTBIM Library** 4.0 from your computer.
- 8 Choose from the following to continue.

If you are installing SMARTBIM Library Manager for...	Then continue to...
single seat use	Single Seat Installation .
multiple seat use	Multiple Seat Installation .
a network license	Setting up a network license for SMARTBIM Library Manager .

SMARTBIM Library Manager

Single Seat Installation

Related Help Topics

- Downloading the Installer
- System software and hardware requirements
- Disabling Vista and Windows 7 UAC controls
- Single Seat Installation
- Multiple Seat Installation
- Network License Setup
- Activating SMARTBIM Library Manager and contacting your reseller
- Troubleshooting installations on 64-bit systems
- Contacting SMARTBIM Library Manager Customer Care
- Known issues in this release
- Ending support for Revit 2009

This section provides information for installing the **SMARTBIM Library Manager** as part of **SMARTBIM Suite 4.2** software for single seat use on both 32 and 64-bit systems.



Note: If you are using either the Vista® and Windows® 7 operating systems, you must follow the instructions in [Disabling Vista and Windows 7 UAC controls](#) before you can install **SMARTBIM Library Manager**.

Single Seat Installation

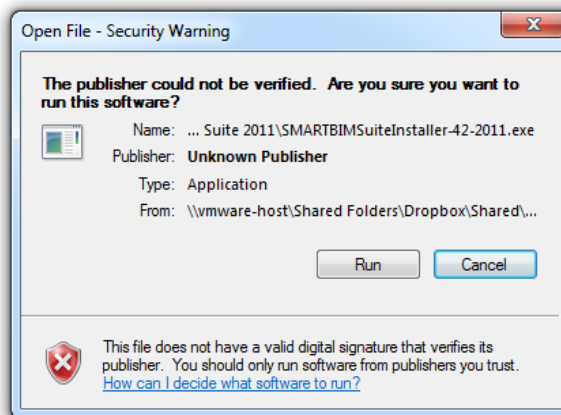
Use the steps in this section if you are installing **SMARTBIM Library Manager** on a single computer for single seat use. If you are an administrator and need to install **SMARTBIM Library Manager** on a network for multiple seat use, see [Setting up multiple seat SMARTBIM Library Manager installations](#).

To install **SMARTBIM Library Manager** for single seat use,

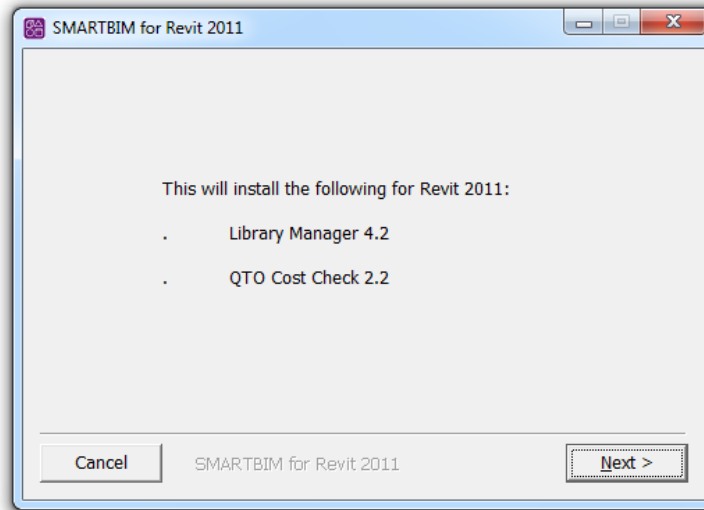
- 1 Verify that your computer meets the [minimum system requirements](#).
- 2 [Download the Installer](#) for **SMARTBIM Suite 4.2**.
- 3 For Vista and Windows 7 users, make sure you have performed the steps in [Disabling Vista and Windows 7 UAC controls](#).
- 4 Un-install **SMARTBIM Library Manager** version 3.8 or older from any PC using the Uninstallers found in "Uninstall or change a Program" (Windows 7) or "Add/Remove Programs" (Windows XP) on the Control Panel.

Please note: Because earlier versions of the software were developed by a company other than SMARTBIM, the uninstallers may erase the License Key and/or user information under the Product License and Information dialog. We recommend that the License key be recorded before proceeding with the uninstallation process as it may need to be re-entered after installation is complete.

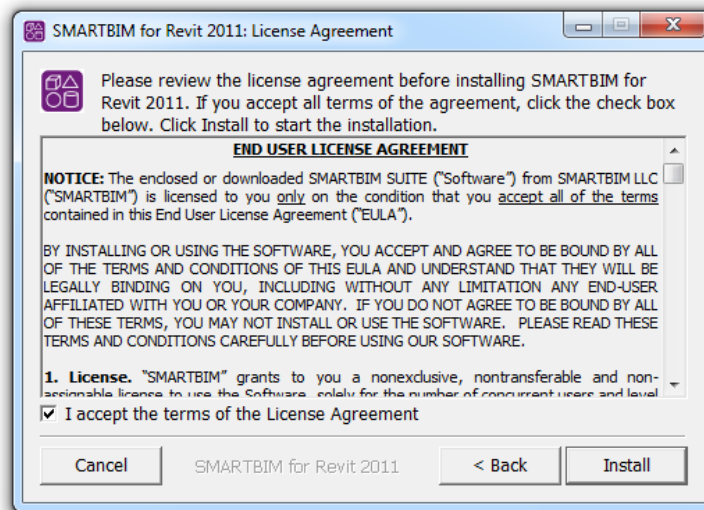
- 5 To run the installer for **SMARTBIM Library Manager** version 4.1, double click on it.
 - An 'Open File' confirmation dialogue will appear. Click 'Run'



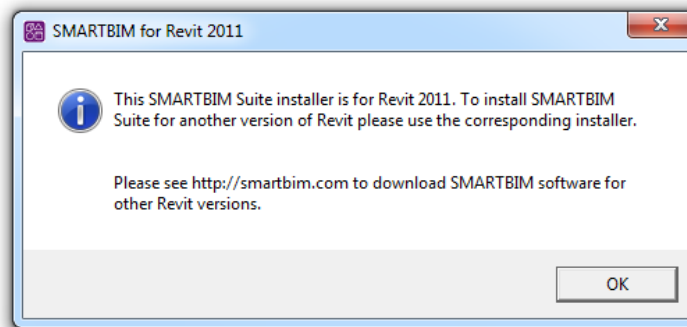
- Click 'Next' when you see the installer confirmation dialogue box



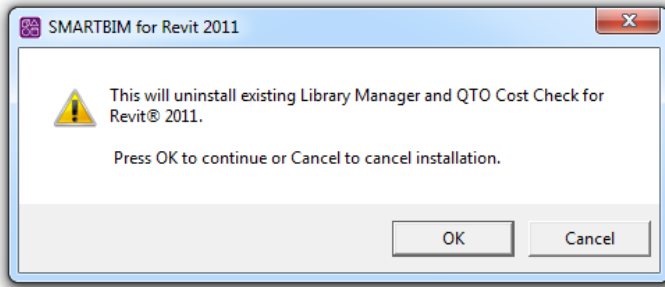
- Click the checkbox to accept the End User License Agreement (EULA), then click 'Install'



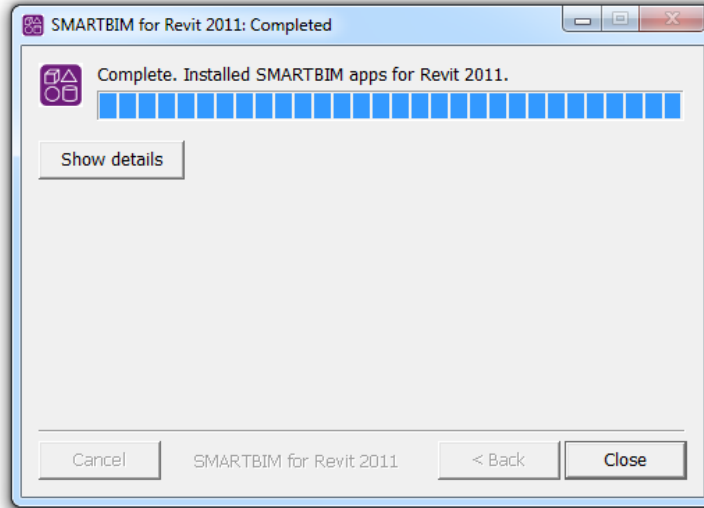
- Click 'OK' to the installer version confirmation message. If you want to install SBL and QTO for a different version of Revit, download the correct installer from the Installer Download page on the SMARTBIM web site.



- The **SMARTBIM 4.1/2.1** installer will un-install **SMARTBIM Library Manager 4.0** and **QTO 2.0** if they are installed on your computer, and preserve your license key and user profile information.
If you un-install **SMARTBIM 4.0/2.0** with the 4.0/2.0 un-installer developed by *Reed Construction Data*, your license key and user profile will not be preserved, and you will need to re-enter it.
We recommend using the **SMARTBIM 4.1/2.1** installer to remove **SMARTBIM Library Manager 4.0** and **QTO 2.0**.
For previous versions, we recommend using the un-installer for the version, and then performing a new install of SBL 4.1/QTO 2.1.
Click 'OK' to the un-install warning message.



- 6 The installer will now proceed. Click 'Close' after it is complete.
 - **SMARTBIM Library Manager** will be installed on your computer with a free 30 day trial license. To activate your subscription license and download SMARTBIM Catalog, launch SBL and enter your subscription license key into the Product and License information dialogue box, see [Activating SMARTBIM Library Manager](#) and [Contacting Your Reseller](#) for more information.



SMARTBIM Library Manager

Multiple Seat Installation

Related Help Topics

- [Downloading the Installer](#)
- [System software and hardware requirements](#)
- [Disabling Vista and Windows 7 UAC controls](#)
- [Single Seat Installation](#)
- [Multiple Seat Installation](#)
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- [Contacting SMARTBIM Library Manager Customer Care](#)
- [Known issues in this release](#)
- [Ending support for Revit 2009](#)

Configuring and deploying SMARTBIM Library Manager to multiple-seats

SMARTBIM Library Manager must be installed on the desktop of each end-users' computer, however, the **SMARTBIM Library Manager Default Catalog** as well as user-defined catalogs can be installed on a local area network (LAN). This section provides the steps necessary for setting up shared configuration files and instructions for batch deployment from an 'administrator' computer.

The procedures in this section are intended for system administrators and require basic network skills, including the use of batch files. If you are not the system administrator or have any questions about this procedure, contact [SMARTBIM Library Manager Customer Care](#).

Below is a summary for configuring and deploying **SMARTBIM Library Manager** to multiple-seats:

- [Installing SMARTBIM Library Manager on the 'administrator' computer:](#)
 - A. Un-install old versions of **SMARTBIM Library Manager** from the 'administrator' computer.
 - B. Install **SMARTBIM Library Manager** version 4.1 on the 'administrator' computer.
 - C. Activate the license on the 'administrator' computer.
- Configure the end users' setup on the 'administrator' computer with the following (optional):
 - A. [Access the SMARTBIM Catalog from a shared drive on the LAN;](#)
 - B. [Access user-defined catalogs from a shared drive on the LAN;](#)
 - C. [Configure the Content Update Service on or off.](#)
- **Silent Installer:** Batch install **SMARTBIM Library Manager** and copy the configuration files to each of the end users' computers.
- [Test the system.](#)

Installing SMARTBIM Library Manager on the 'administrator' computer

This section contains the steps for installing **SMARTBIM Library Manager** for multiple-seat use. Use the steps in this section if you are the administrator in a networked system and are installing **SMARTBIM Library Manager**.

To install **SMARTBIM Library Manager** on the 'administrator' computer,

- 1 Verify that the 'administrator' and each end-user computer meet the [minimum system requirements](#).
- 2 [Download the Installer](#) for **SMARTBIM Library Manager** and **QTO Cost Check**.
- 3 For Vista and Windows 7 users, make sure you have performed the steps in [Disabling Vista and Windows 7 UAC controls](#).
- 4 Un-install **SMARTBIM Library Manager** version 3.8 or older from any PC using the uninstallers found in "Uninstall or change a Program" (Windows 7) or "Add/Remove Programs" (Windows XP) on the Control Panel.

Please note: Versions 3.8 and earlier were developed by Reed Construction Data not SMARTBIM. The uninstallers for these versions will not save the License Key and/or user information under the Product License and Information dialog. We recommend that the License Key be recorded before proceeding with the uninstallation process.

- 5 Install **SMARTBIM Suite (Library Manager 4.2/QTO Cost Check 2.2)** on the 'administrator' computer, using the installation process described for a [Single Seat Installation](#).
- 6 Activate the **SMARTBIM Library Manager** license and make a note of the License Key and the file location:

C:\Common Files\SMARTBIM\license\SMARTBIM.lic

For 'Desktop License' installations the license file will be batch copied to the modeler's desktops with the other configuration files, see [Silent Installer](#) below for more information. For more information on activating your license see: [Activating SMARTBIM Library Manager](#).

For Network Seat type installations the license file should **NOT** be batch copied to the modeler's desktops with the other configuration files. See [Network License Setup](#) for more information.

Once the license is activated, the 'administrator' computer can now be configured with the optional shared SMARTBIM Library Manager Default Catalog, user-defined catalogs, and Content Update Service.

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Setting up a shared SMARTBIM Catalog on a LAN

You can set up your network so that each end-user installation of **SMARTBIM Library Manager** points to the same LAN drive location for the **SMARTBIM Catalog**.

To set up **SMARTBIM Catalog** on a LAN drive,

- 1 Close all open instances of **SMARTBIM Library Manager**.
- 2 Start Windows Explorer and click **Tools > Map Network Drive** to open the *Map Network Drive* menu.
- 3 Map a network drive.

Example: Z:\

- 4 Create the directory *SMARTBIM* in the new location.

Example: Z:\SMARTBIM

- 5 Open the following location:

C:\Common Files\2011\SmartBIM\SmartBIM Library

Note: This is the location of the file for **SMARTBIM Library Manager** for Revit 2011. The location of the file for **SMARTBIM Library Manager** for Revit 2010 is: *C:\Common Files\2010\SmartBIM\SmartBIM Library*

- 6 Locate and copy the following folder:

DefaultLibrary_2011 (or *DefaultLibrary_2010* for **SMARTBIM Library Manager** for Revit 2010)

- 7 Paste the folder in the directory you created in step 4.

Example: Z:\SMARTBIM\DefaultLibrary_2011

- 8 Open the following location:

C:\Program Files\SMARTBIM\2011\SmartBIM Library\plugins\tectonic.library_1.0.0

OR *C:\Program Files\SMARTBIM\2010\SmartBIM Library\plugins\tectonic.library_1.0.0* for **SMARTBIM Library Manager** for Revit 2010

- 9 Locate and open the following file for editing:

BLM.properties

- 10 Locate the following line in the file:

default.library.dir = \\DefaultLibrary_2011

OR *default.library.dir = \\DefaultLibrary_2010* for **SMARTBIM Library Manager** for Revit 2010

- 11 Edit the file to have the new location and folder names you mapped in step 4.

Note: Be sure you use double slashes \\ in the path.

Example: *default.library.dir = Z:\SMARTBIM\DefaultLibrary_2011*

- 12 Start the **SMARTBIM Library Manager** application.

- 13 The **Silent Installer** will copy the edited *BLM.properties* file to each end-user computer.

Result: Each end-user installation of **SMARTBIM Library Manager** points to the **SMARTBIM Catalog** on the LAN.

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Setting up shared user-defined catalogs

This section contains the steps for setting up catalogs defined by the administrator that can be shared by all users in a network.

To set up shared catalogs,

- 1 On the administrator computer create as many catalogs as you need for use within the shared group.
- 2 Copy the catalogs folder(s) to a single location on a shared drive or Local Area Network (LAN).
- 3 Start the **SMARTBIM Library Manager** application.
- 4 From **SMARTBIM Library Manager**, open a catalog you created and copied in [step 1](#) and [step 2](#).
- 5 Close the **SMARTBIM Library Manager** application.

Result: The catalog location is saved into a preferences file at the following location:

C:\Common Files\SMARTBIM\2011\SMARTBIM Library Manager\workspace\metadata\plugins\org.eclipse.core.runtime\settings\tectonic.library.prefs

- 6 The **Silent Installer** will copy the file *library.prefs* to each end-user computer.

Result: Each end user has access to the shared user-defined catalogs.

- 7 Setting permissions on shared folders allows system administrators to open folders in **SMARTBIM Library Manager** across the LAN, inspect and evaluate new families, and copy new families from the end-user's 'scratch pad' catalogs to the office catalog on the shared drive. It is recommended that you set permissions on shared folders from the administrator computer.

Note: For catalogs that project team members create on desktop machines that are connected to a LAN, set user-defined catalog folders to **Shared Folders**.

Role	Folder permission
Administrator	read / write
end-user	read-only

- 8 On each end-user computer, access each shared folder and user-defined catalog you created in the preceding steps.

- 9 Can you access each shared folder and user-defined catalog?
- If yes, the procedure is complete.
 - If no, and you cannot access all of the folders or catalogs, verify that you used the correct procedure, and if necessary, repeat the steps for creating the folders and catalogs. Contact [SMARTBIM Library Manager Customer Care](#) for more information.

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Setting up content updates

You can set content updates for each end-user instance of **SMARTBIM Library Manager** to be either on or off.

To set up content updates,

- 1 On the administrator computer, open the following file location:
`C:\Program Files\SMARTBIM\2011\SBLLauncher\sbllauncher.properties`
- 2 Open the `sbllauncher.properties` file and locate the following configuration property near the top of the file:
`updates.content.enable = true`
- 3 The value "`true`" is the default value when **SMARTBIM Library Manager** is installed. The values `true` and `false` determine if the Content Update Service is active or not:
 - `true` - enables the Content Update Service
 - `false` - disables the Content Update Service
- 4 The [Silent Installer](#) will copy the `sbllauncher.properties` file to each end-user computer.
Result: Each end-user has the same content update setting.

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Silent Installer

The **SMARTBIM Suite 4.2** Silent Installer (for **SMARTBIM Library Manager**) is the regular **SMARTBIM Suite 4.2** Installer set to run the installation process without the need for user keyboard input.

- 1 [SMARTBIM Library Manager Customer Care](#) provides a Silent Installer that contains the following:
 - The `.exe` **SMARTBIM Suite 4.2** installer (for **SMARTBIM Library Manager**)
 - The network manager installer, see [Network License Setup](#) for more information.
 - A readme file.
 - A batch file that runs the installer silently and (optionally) copies **SMARTBIM Library Manager** configuration files to each desktop installation if they were prepared by the local system admin.
- 2 The optional **SMARTBIM Library Manager** configuration files include:
 - `BLM.properties`: configure the 'default.library.dir' variable in this file to set up the [SMARTBIM Catalog on a LAN](#);
 - `tectonic.library.prefs`: this file sets the location of [user-defined catalogs](#);
 - `sbllauncher.properties`: configure the 'updates.content.enable' variable in this file to set the [Content Update Service](#) on or off;
 - `SmartBIM.lic`: for [desktop license seats](#), copy this file to each SMARTBIM Library Manager desktop installation to activate the desktop license.
- 3 You can execute the batch install process from a DOS command prompt:
 - A. Open a command prompt from the MS Windows Start Menu
 - B. At the DOS command prompt, Change the directories to `C:\Temp\SMARTBIM-v4.1-SI-2011`
 - C. At the DOS prompt, type `SmartBIM_SilentInstaller_2011_v4_1.bat`
 - D. Select the options desired at the options prompt

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Test the System

Test the system on each end-user computer to ensure that the shared items appear as expected.

- 1 Open **SMARTBIM Library Manager** and review the shared **SMARTBIM Library Manager** Default Catalog.
- 2 Open **SMARTBIM Library Manager** and check for shared User-defined catalogs.

- 3 Open **SMARTBIM Library Manager** and review that the Content Update Service is shared.
- 4 Open **SMARTBIM Library Manager**, under the License and Product Information dialog review that the License Key is shared for 'Desktop License' installations.

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SMARTBIM Library Manager

Network License Setup

Related Help Topics

- [Downloading the Installer](#)
- [System software and hardware requirements](#)
- [Disabling Vista and Windows 7 UAC controls](#)
- [Single Seat Installation](#)
- [Multiple Seat Installation](#)
- [Network License Setup](#)
- [Activating SMARTBIM Library Manager and contacting your reseller](#)
- [Troubleshooting installations on 64-bit systems](#)
- [Contacting SMARTBIM Library Manager Customer Care](#)
- [Known issues in this release](#)
- [Ending support for Revit 2009](#)

Network licensing for **SMARTBIM Library Manager** and **QTO Cost Check** allows any computer on your organization's internal network to activate a license for up to the total number of license seats purchased, providing for flexibility and savings for most multi-seat installations. You can purchase additional seats from your reseller as you require them.

This section illustrates the steps for installing the Network License Manager for **SMARTBIM Library Manager** and **QTO Cost Check**, activating the network license manager, and setting up **SMARTBIM Library Manager** and **QTO Cost Check** client applications to check out and check in license seats from the network license manager.

Who should use this procedure

The procedure in this section is intended for use by system administrators. If you are not the system administrator or have any questions about this procedure, contact [SMARTBIM Library Manager Customer Care](#) before continuing.

Switching from network to standalone licensing

A single-seat license key is required if you switch a networked PC to standalone (non-network) use. Contact [SMARTBIM Library Manager Customer Care](#) for more information.

This section contains the following topics:

- [Stages of setting up SMARTBIM Library Manager network licensing](#)
- [Network License Setup](#)

Stages of setting up SMARTBIM Library Manager network licensing

The following table describes the stages of Network License Setup.

Stage	Description
1	Purchase SMARTBIM Library Manager with a network license from your reseller.
2	Send your customer ID, SMARTBIM Library Manager product license key, and administrator PC host and server information to SMARTBIM Library Manager Customer Care .
3	Using the links provided by your reseller, download both the network license manager installer and the SMARTBIM Library Manager application on your administrator PC.
4	Run the network license manager installer on the administrator PC.
5	Save the network license file you receive from SMARTBIM in the same folder where the network license manager was installed.
6	Start the network license server and activate the network license using the network license manager tool.
7	Install and start SMARTBIM Library Manager on the administrator PC. Note: You can also use the silent installer package to install SMARTBIM Library Manager and QTO Cost Check by batch script on multiple PCs. For more information, contact SMARTBIM Library Manager Customer Care
8	For the SMARTBIM Library Manager license type, select Network and enter your server name.
9	On each PC in your network, install and start SMARTBIM Library Manager , select Network for the license type and enter the server name value.
10	Review the server status and number of license seats checked out and number of license seats available using the network license manager tool.

Network License Setup

Network License Setup is a multi-stage process. You must follow the steps in the correct sequence in order to successfully set up network licensing for **SMARTBIM Library Manager**.

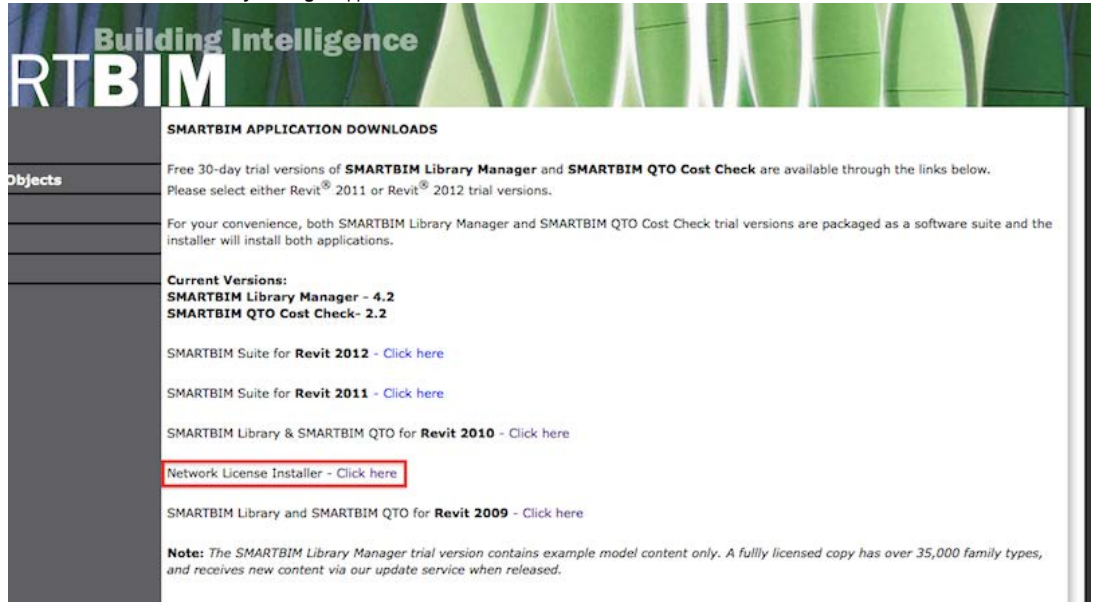
Note: When you purchase your network license, your reseller sends you a confirmation e-mail containing links for both the **SMARTBIM Library Manager** application and the network installer. You must have the e-mail from your reseller before you can perform the network installation procedure.

Note: The Network License Installer software by FlexLM does not support Mac Servers. The software is supported on the following Windows based servers:

- Win32-bit 98/NT/2000/ 2003/XP/ME/Vista/Win 7 Intel x86
- Microsoft Windows 64-bit on Intel Xeon
- Windows 64-bit Itanium
- Java Standard Edition

To set up network licensing for **SMARTBIM Library Manager**,

- 1 Configure your e-mail service to allow e-mails from *SMARTBIMSupport@smartbim.com*.
- 2 On any PC running Vista or Windows 7, UAC settings must be disabled. See [Disabling Vista and Windows 7 UAC controls](#) for more information.
- 3 On the e-mail from your reseller, click the link for downloading the network license installer which will open the SMARTBIM website and download the following:
 - o the Network License Installer
 - o the SMARTBIM Library Manager application



- 4 Contact Customer Care at [SMARTBIM Library Manager Customer Care](#) with your system information. This data is used in creating the network license file for your version of SMARTBIM Library Manager.

You must include the following information in your e-mail:

Item	Description
Customer ID	The <i>Customer ID</i> provided in the e-mail from your reseller.
License Key	The <i>License Key</i> provided in the e-mail from your reseller.
License server name	The <i>host server</i> name for the administrator PC.
License server machine HostID	The <i>HostID</i> value for the administrator PC.

For the administrator PC host and server information launch the Command Prompt from the Start Menu / Accessories and type the following:

ipconfig /all

The following information will display:

```

Administrator: Command Prompt
C:\>ipconfig/all
Windows IP Configuration

Host Name . . . . . : WIN-ESU9C5G00
Primary Dns Suffix . . . . . : 
Node Type . . . . . : Broadcast
IP Routing Enabled. . . . . : No
WINS Proxy Enabled. . . . . : No
DNS Suffix Search List. . . . . : localdomain

Ethernet adapter Local Area Connection:

Connection-specific DNS Suffix . : localdomain
Description . . . . . : Intel(R) PRO
Physical Address. . . . . : 00-0C-29-3F-
DHCP Enabled. . . . . : Yes
Autoconfiguration Enabled . . . . : Yes
Link-local IPv6 Address . . . . . : fe80::5be:4c
IPv4 Address. . . . . : 192.168.50.4
Subnet Mask . . . . . : 255.255.255.
Lease Obtained. . . . . : Wednesday, 0
Lease Expires . . . . . : Wednesday, 0
Default Gateway . . . . . : 192.168.50.2
DHCP Server . . . . . : 192.168.50.2
DHCPv6 IID . . . . . : 238834157
DHCPv6 Client DUID. . . . . : 00-01-00-01-
DNS Servers . . . . . : 192.168.50.2
NetBIOS over Tcpip. . . . . : Enabled

Tunnel adapter Local Area Connection* 11:

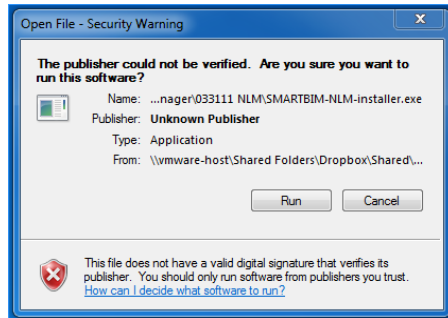
Connection-specific DNS Suffix . : Teredo Tunne
Description . . . . . : 
Physical Address. . . . . : 00-00-00-00-
DHCP Enabled. . . . . : No
Autoconfiguration Enabled . . . . : Yes
IPv6 Address. . . . . : 2001:0:4137:
Link-local IPv6 Address . . . . . : fe80::18f:2
Default Gateway . . . . . : 
NetBIOS over Tcpip. . . . . : Disabled

Tunnel adapter Isatap.localdomain:

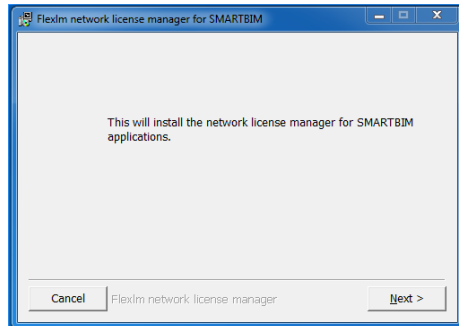
Media State . . . . . : Media discon
Connection-specific DNS Suffix . : localdomain
Description . . . . . : Microsoft IS
Physical Address. . . . . : 00-00-00-00-
DHCP Enabled. . . . . : No
Autoconfiguration Enabled . . . . : Yes
C:\>

```

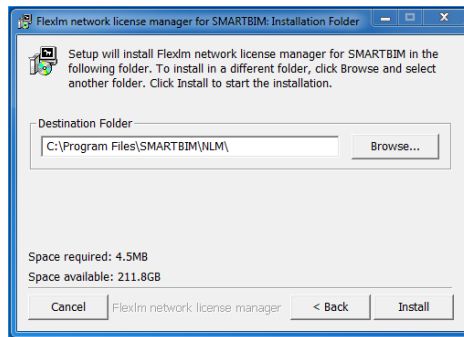
- 5 Run the network license manager installer on the computer that will be the network license server.
- o The installer will open with an "Open File - Security Warning" dialog. Click 'Run'.



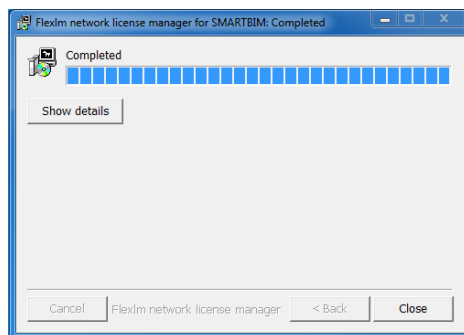
- o The installer will continue with an information dialog for the FlexIm network License Manager for SMARTBIM. Click 'Next.'



- o The installer will provide a 'Destination Folder' for installing the software. If another location is desired click the 'browse' button and browse to that location. Once the appropriate Destination Folder is selected click 'Install'.



- o The installer will continue until complete. Click 'close' once complete.

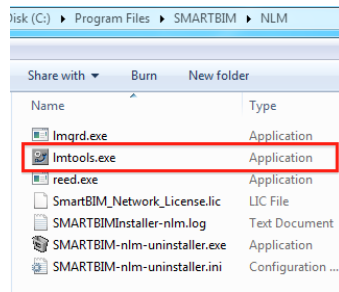


- 6 When you receive the license file from SMARTBIM Library Manager Customer Care, save the file in the same folder where you installed the network license manager on the administrator PC.

Caution: If you need to copy the license file onto a clipboard, use Notepad or other text editing program and be sure to remove the .txt extension before you use the file. Do not copy the license using a word processing program, such as Word, before pasting it into the SMARTBIM Library Manager directory, as doing so adds formatting data that corrupts the file.

- 7 To activate the network license manager server open a windows explorer to the folder selected as the installer destination folder and double click on the application:

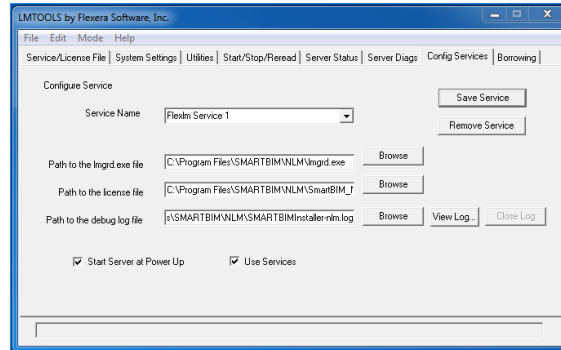
Imtools.exe



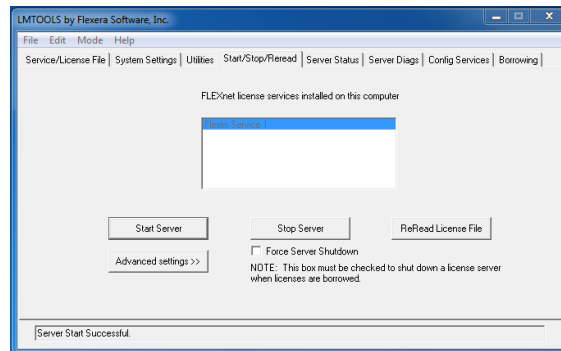
8 To start the server:

- Click on the *Config Services* tab and activate the network license manager's license first browse to the following three files in the destination folder: *license file*, *Imgrd.exe file*, and *debug log file* (note: this file is optional and must be created using a empty text file)

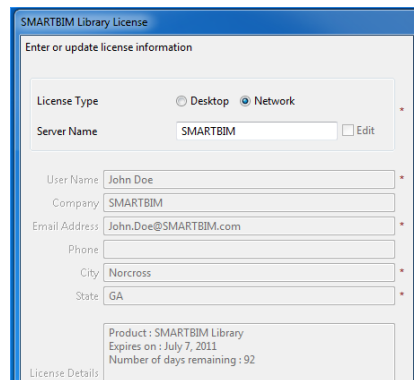
Next click on *Save Service* button.



- Click on the *Start/Stop Reread* tab and pick the *Start Server* button. The network license manager server should process and then display the following message at the bottom of the screen: *Server Start Successful*.



9 To active license check out and check in from SMARTBIM Library Manager, open the Product and License Information view (Help->Product and License Information...), click on the Network button, and enter the license manager server name.

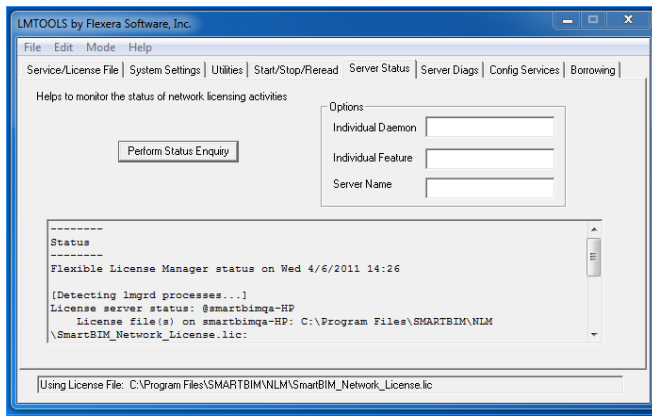


Test the license check out and check in functionality from the **SMARTBIM Library Manager** installed on your administrator computer.

Once you are satisfied it is operational, send email to each user of **SMARTBIM Library Manager** or **QTO Cost Check** in your firm that explains how to activate the network license from their desktop installation of the product.

Please note that **SMARTBIM Library Manager** and **QTO Cost Check** require a separate network license file.

10 To review the total number of license seats available and the number of seats that are checked out pick on the 'Server Status' tab and click on the 'Perform Status Enquiry' button. Use the scroll to review the status of the network license server.



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SMARTBIM Library Manager

Activating SMARTBIM Library Manager and contacting your reseller

Related Help Topics

- System software and hardware requirements
- Disabling Vista and Windows 7 UAC controls
- Single Seat Installation
- Multiple Seat Installation
- Network License Setup
- Activating SMARTBIM Library Manager and contacting your reseller
- Troubleshooting installations on 64-bit systems
- Contacting SMARTBIM Library Manager Customer Care
- Known issues in this release
- Ending support for Revit 2009

If you are using a trial version of **SMARTBIM Library Manager**, you must activate the license key within the thirty (30) day trial period to prevent your copy of the software from expiring. You can contact your reseller for assistance in purchasing a license key.

Additionally, you can contact your reseller for product information and for support with any issues you may experience using **SMARTBIM Library Manager**.

This section contains the following topics:

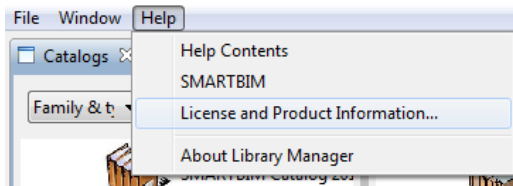
- [Activating SMARTBIM Library Manager](#)
- [Contacting your reseller](#)

Activating SMARTBIM Library Manager

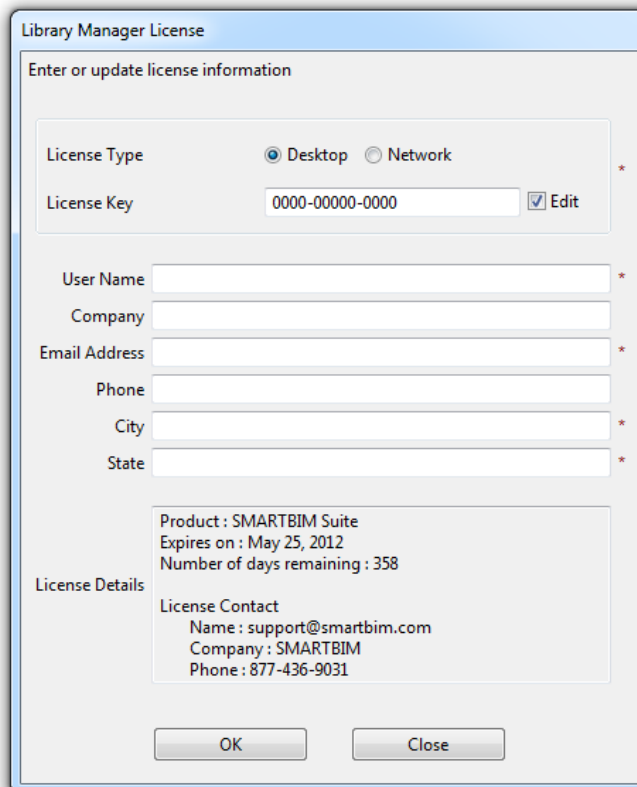
This section contains the steps for activating your copy of **SMARTBIM Library Manager**. You can also use this section for information about reviewing your license information for technical support or for license renewal.

To activate your copy of **SMARTBIM Library Manager**,

- 1 From the **SMARTBIM Library Manager** main menu, click **Help** and then click **License and Product Information....**



Result: The *SMARTBIM Library Manager License* menu is displayed, as shown in following example of a single-seat license:

A screenshot of the 'Library Manager License' dialog box. The title bar reads 'Library Manager License'. The main area is titled 'Enter or update license information'. It contains several fields: 'License Type' with radio buttons for 'Desktop' (selected) and 'Network'; 'License Key' with the value '0000-00000-0000' and an 'Edit' checkbox; 'User Name', 'Company', 'Email Address', 'Phone', 'City', and 'State' text boxes. Below these is a 'License Details' section showing: 'Product : SMARTBIM Suite', 'Expires on : May 25, 2012', and 'Number of days remaining : 358'. At the bottom, there is a 'License Contact' section with 'Name : support@smartbim.com', 'Company : SMARTBIM', and 'Phone : 877-436-9031'. 'OK' and 'Close' buttons are at the bottom.

- 2 Check the **Activate** box and in the boxes provided, enter your user name and e-mail address.

Click **OK** when you are finished.

Result: The *SMARTBIM License Agreement* menu is displayed.

- 3 Read the End User License Agreement (EULA) and click **I Agree**.

Note: Clicking **I Disagree** closes the menu.

Result: A message is displayed confirming your registration.

- 4 Click **OK** to close the message and return to **SMARTBIM Library Manager**.

Contacting your reseller

Your **SMARTBIM Library Manager** reseller can help you with information and product support if you experience issues using **SMARTBIM Library Manager**. Before you contact your reseller, you must have your **SMARTBIM Library Manager** license information.

To get your **SMARTBIM Library Manager** license information,

- 1 From the **SMARTBIM Library Manager** main menu, click **Help** and then click **License and Product Information...**

Result: The *SMARTBIM Library Manager License* menu is displayed, as shown in following example of a single-seat license:

Library Manager License

Enter or update license information

License Type Desktop Network *

License Key 0000-00000-0000 Edit *

User Name John Builder *

Company SMARTBIM

Email Address johnbuilder@company.com *

Phone

City San Francisco *

State CA *

License Details

Product : SMARTBIM Suite
Expires on : May 25, 2012
Number of days remaining : 358

License Contact
Name : support@smartbim.com
Company : SMARTBIM
Phone : 877-436-9031

OK Close

- 2 Print this page and record your product information in the following worksheet:

Field	Your information
License Type	
License Key	
User Name	
Company	
Email Address	
Phone	
City	
State	
Product	
Expires on	

<i>Number of days remaining</i>		
<i>License Details</i>	<i>Name</i>	
	<i>Company</i>	
	<i>Phone</i>	

3 When contacting your reseller,

- Prepare a description of the problem or enhancement request. For problems, include any steps that may have resulted in the issue, or any procedures that you have used to try to correct the problem.
- Locate the application log files in: *C:\Common Files\SMARTBIM\logs\sl* and *C:\Common Files\2011\SmartBIM\logs (for Revit 2011 version)* or *C:\Common Files\2012\SmartBIM\logs (for Revit 2012 version)*.
- If contacting by e-mail, create a .zip file of the log files in the application log file folder and attach the file to your e-mail.

SMARTBIM Library Manager

Troubleshooting SMARTBIM Library Manager installations on 64-bit systems

Related Help Topics

System software and hardware requirements

Disabling Vista and Windows 7 UAC controls

Single Seat Installation

Multiple Seat Installation

Network License Setup

Activating SMARTBIM Library Manager and contacting your reseller

Troubleshooting installations on 64-bit systems

Contacting SMARTBIM Library Manager Customer Care

Known issues in this release

Ending support for Revit 2009

SMARTBIM Library Manager on 64-bit systems.

To troubleshoot **SMARTBIM Library Manager** on 64-bit systems,

- 1 Verify that your computer meets the [minimum system requirements](#).
- 2 **Windows 7** and **Vista** users must complete the steps in [Disabling Vista User Account Control \(UAC\)](#) to allow access to system controls.
- 3 The Java software on your computer must be installed and running for **SMARTBIM Library Manager** to work correctly.

Note: Even on 64-bit systems, 32-bit Java is required for **SMARTBIM Library Manager** to operate correctly.

To verify that Java is installed and running correctly on your system,

- Click **Start > Run**
- In the *Run* box, type **java**

Result: Choose from the following for your results.

If Java...	Then perform the following steps:
runs	<ol style="list-style-type: none"> 1 Click Start and then right click the icon for My Computer and select Properties. Result: The <i>System Properties</i> menu is displayed. 2 From the <i>System Properties</i> menu, click the tab for Advanced and then click Environmental Variables. Result: The <i>System Variables</i> menu is displayed. 3 In the <i>System Variables</i> menu, locate and delete the following variable: <code>SMARTBIM_JAVA_HOME</code> 4 Save your changes and close all windows.
does not run	<ol style="list-style-type: none"> 1 Start Windows Explorer and access <i>C:\Program Files (x86)\Java</i>. 2 Do you have multiple versions of <i>Java</i> listed? <ul style="list-style-type: none"> • If yes, locate the most recent version of <i>Java</i> on your system. Example: If you have <i>jre1.5.0_02</i> and <i>jre1.6.0_07</i> installed, the most recent version of <i>Java</i> is <i>jre1.6.0_07</i>. • If no, continue to the next step. 3 Click on the <i>bin</i> folder to display the full path to that folder in the address bar. Example: <i>C:\Program Files(x86)\Java\jre1.6.0_07\bin</i> 4 Copy the path in the address bar to your clipboard. 5 Click Start or click the <i>Windows</i> icon. 6 Right click either Computer or the icon for My Computer and select Properties Result: The <i>System Properties</i> menu is displayed. 7 Click the tab for Advanced and then click Environmental Variables Result: The <i>System Variables</i> window is displayed. 8 In the <i>System Variables</i> window, is there a variable <i>SMARTBIM_BIM_HOME</i>? <ul style="list-style-type: none"> • If yes, click edit. Continue to the next step • If no, follow the menu instructions to create the variable. 9 Enter the Java path version information you recorded in step 3 into the values for <i>SMARTBIM_BIM_HOME</i>. 10 Save your changes and close all open windows. 11 Restart the SMARTBIM Library Manager application.

SMARTBIM Library Manager

Known issues in this release

Related Help Topics

[System software and hardware requirements](#)

[Disabling Vista and Windows 7 UAC controls](#)

[Single Seat Installation](#)

[Multiple Seat Installation](#)

[Network License Setup](#)

[Activating SMARTBIM Library Manager and contacting your reseller](#)

[Troubleshooting installations on 64-bit systems](#)

[Contacting SMARTBIM Library Manager Customer Care](#)

[Known issues in this release](#)

[Ending support for Revit 2009](#)

The following is a list of known issues affecting the current **SMARTBIM Library Manager** release:

- In some instances, Autodesk Design Review (ADR) displays a HOOPS error when manipulating a 3D model in the DWF viewer. This is a known ADR issue. Ignore the HOOPS error message and close the message box when displayed.
- The DWF viewer in **SMARTBIM Library Manager** often defaults to showing the "back" of the object when *Autodesk Design Review (ADR) 2012* is installed (*ADR 2012* is a free DWF tool that is packaged with *Revit 2012*). This is not a problem caused by **SMARTBIM Library Manager**, but rather a documented bug with the way in which *ADR 2012* saves camera view settings when DWFs are created in *Revit 2012*. The workaround is to uninstall *ADR 2012* and install *ADR 2011*. See the following site for downloading the *ADR 2011* installer.
- You cannot drag-and-drop *Family Types* from **SMARTBIM Library Manager** into *Revit*. The work around is to load the family into *Revit*, select the family from the *Revit Project Browser* tree, right-click and then select the **Reload** command. A *Type* table is displayed, allowing you to select the *Types* to load.
- On the License and Product Information page the number of days remaining is one more than the actual number of days remaining for the license.
- Certain families cause an internal memory exception in *Revit 2011* when using Rapid Publishing Mode on 64-bit systems causing those families to not be published, however the problem does not exist on 32-bit systems. **SMARTBIM** contacted *Autodesk* regarding this issue in September 2010 and a ADN report was generated (Problem ID 1262959). *Autodesk* has recognized this as a problem with *Revit* for 64-bit operating systems.
- There are several issues related to a problem with the third party indexing software used by **SMARTBIM Library Manager**. In the **SMARTBIM Library Manager** Default Catalog recently added tags are not searchable until the index is updated. For certain packages downloaded to the **SMARTBIM Library Manager** Default Catalog the family count in the Catalog pane does not match the actual family count. To update the catalog right click on the catalog folder in the catalog tree select 'Update catalog' and then 'Index.'
- Parameter Reporting does not provide reporting for all families.
- When a family is deleted or overwritten in a user-defined catalog, a backup of the family is placed in a deleted files folder. The size of this folder will increase over time and therefore it is recommended that the "*File > Advanced > Clear Backup Files*" command be part of periodic maintenance of **SMARTBIM Library Manager** user defined catalogs.

Known issues for Family Content Publisher (FCP):

- Due to the size and type of data involved in publishing family folders in *Revit*, it is recommended that you run the publishing process on a dedicated PC to maximize operating speed and functionality.
- The *Revit* API does not support extraction of category information from *Curtain Panel* component families. FCP currently does not extract family data for *Curtain Panel* component families.
- In situations where FCP processes a hosted family and a non-hosted family with the same name exists in the project, *Revit* displays a message that interrupts FCP processing. To continue, click **OK** to exit the warning message.
- *Revit* caches family data when loading families during the family content publishing (FCP) process. For large collections of families, it is possible for *Revit* to issue an out of memory message and stop functioning. If this occurs **SMARTBIM Library Manager** will publish up to the point of the *Revit* crash. After restarting Publish Mode in *Revit*, right click on the partially published catalog and select "Update Catalog" / "Publish New Families". **SMARTBIM** recommends publishing families in collections of 500 families or less at a time, and then using the *Catalog Copy* command to merge published families into a master catalog.

SMARTBIM Library Manager

Ending support for Revit 2009

Related Help Topics

[System software and hardware requirements](#)

[Disabling Vista and Windows 7 UAC controls](#)

[Single Seat Installation](#)

[Multiple Seat Installation](#)

[Network License Setup](#)

[Activating SMARTBIM Library Manager and contacting your reseller](#)

[Troubleshooting installations on 64-bit systems](#)

[Contacting SMARTBIM Library Manager Customer Care](#)

[Known issues in this release](#)

[Ending support for Revit 2009](#)

SMARTBIM Library Manager support for *Revit 2009* is scheduled to end in the near future.

This means that:

- The name for the *SMARTBIM Catalog* used for *Revit 2009* changes to *DefaultCatalog_2009*.
- The new location for the catalog is: *C:\Common Files\SMARTBIM\SMARTBIM Library Manager\DefaultCatalog_2009*.
- You will no longer receive content updates to the *SMARTBIM Catalog* for *Revit 2009*.
- The content update feature for *Revit 2010* will be enabled.

Contact [SMARTBIM Library Manager Customer Care](#) if you have any questions about support issues for *Revit 2009*.

SMARTBIM Library Manager

Using SMARTBIM Library Manager

Related Help Topics

[Welcome to SMARTBIM Library Manager Online Help](#)

[Getting started](#)

[Using SMARTBIM Library Manager](#)

[Publishing catalogs](#)

[Downloading content updates](#)

[Contacting SMARTBIM Library Manager Customer Care](#)

Help Contents

- [User Interface Overview](#)
- [File, Window, and Help menus](#)
- [Working with panes](#)
- [Working with catalogs](#)
- [Working with families](#)
- [Searching in SMARTBIM Library Manager](#)
- [Working with references](#)
- [Working with tags](#)

SMARTBIM Library Manager

User Interface Overview

Related Help Topics

- User Interface Overview
- File, Window, and Help menus
- Working with panes
- Working with catalogs
- Working with families
- Searching in SMARTBIM Library Manager
- Working with references
- Working with tags

This section describes the components of the **SMARTBIM Library Manager (SBL)** interface:

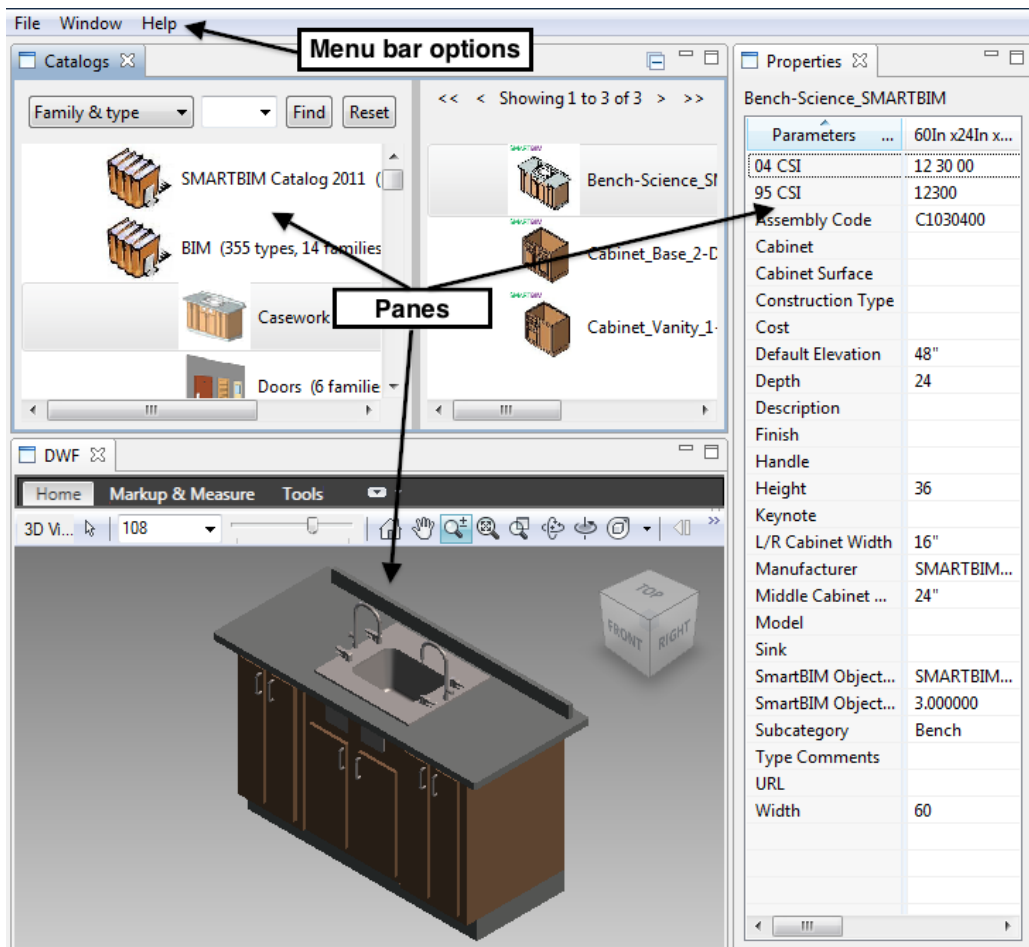
- [Menu bar and panes](#)
- [Catalog components](#)
- [Searching catalogs](#)

Menu bar and panes

The menu bar lets you open, close, and create catalogs, open panes, load content, set preferences, access the SBL Help options, and other actions. For more information, see [File, Window, and Help menus](#).

Panes are the individual windows that make up the SBL workspace. You can move panes around the workspace, off the workspace, and onto another monitor in a system with more than one display. See [Working with panes](#) for more information.

The following example shows the menu bar at the top of the window, and the panes (*Catalogs*, *Properties*, and *DWF*) currently open in the display:



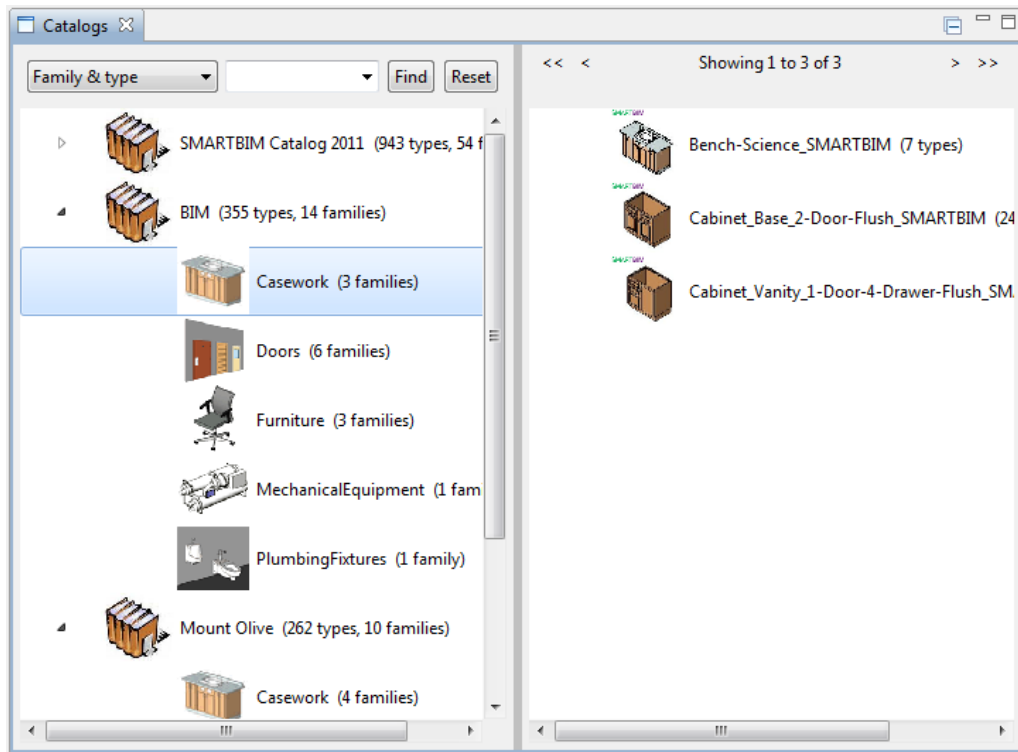
Catalog components

Revit Families in the **SMARTBIM Catalog** and **User Defined** catalogs are organized with the following hierarchy:

catalog > category > family > type.

The Catalogs pane is divided into two columns or areas. The area shown on the left (see image below) displays SBL catalogs organized by Category each of which contain Families. The area shown on the right (see image below) displays Families within the selected Category. The number of Families displayed per page can be set in Preferences, see [Using Windows Options](#).

The following is an example of the *Catalogs* pane:

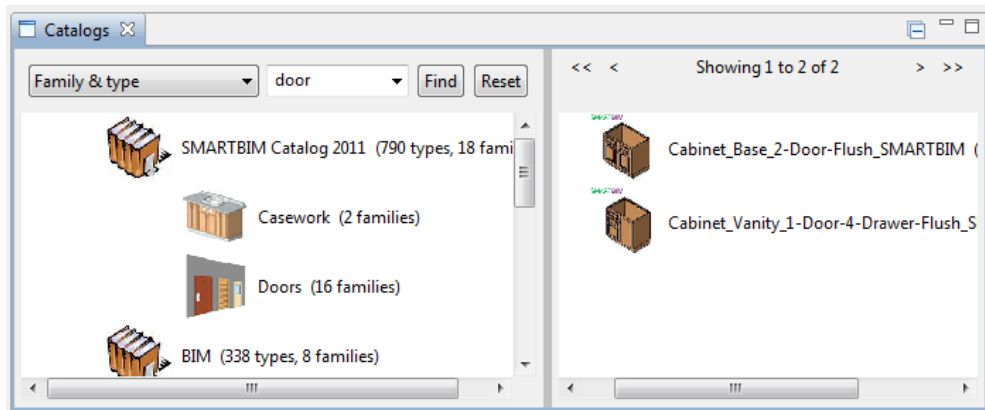


For more information about catalogs, see [Working with catalogs](#).

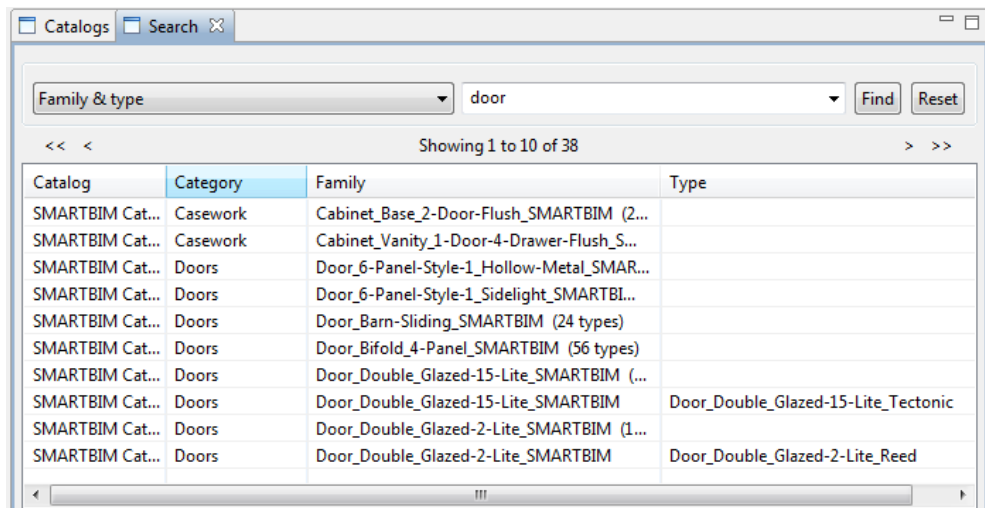
Searching catalogs

When you search in SBL, you can use the search feature on the *Catalogs* pane to return graphic results, or use the *Search* pane for text-based result.

The following is an example of graphical search results using the *Catalogs* pane:



The following is an example of text-based search results using the *Search* pane:



For more information about searching in SBL, see [Searching in SMARTBIM Library Manager](#).

SMARTBIM Library Manager

File, Window, and Help menus

Related Help Topics

- [User Interface Overview](#)
- [File, Window, and Help menus](#)
- [Working with panes](#)
- [Working with catalogs](#)
- [Working with families](#)
- [Searching in SMARTBIM Library Manager](#)
- [Working with references](#)
- [Working with tags](#)

The menu bar options at the top of the **SMARTBIM Library Manager** window are *File*, *Window*, and *Help*. This section describes the functions you can perform using the menu bar options.

This section contains the following topics:

- [Using File menu options](#)
- [Using Window menu options](#)
- [Using Help menu options](#)

Using File menu options

Clicking **File** from the **SMARTBIM Library Manager** menu bar gives you access to the following options:

- Open the **SMARTBIM** catalog
- Create a new user-defined catalog
- Open a new user-defined catalog
- Close a catalog
- Load published content

The following table describes the *File* menu options.

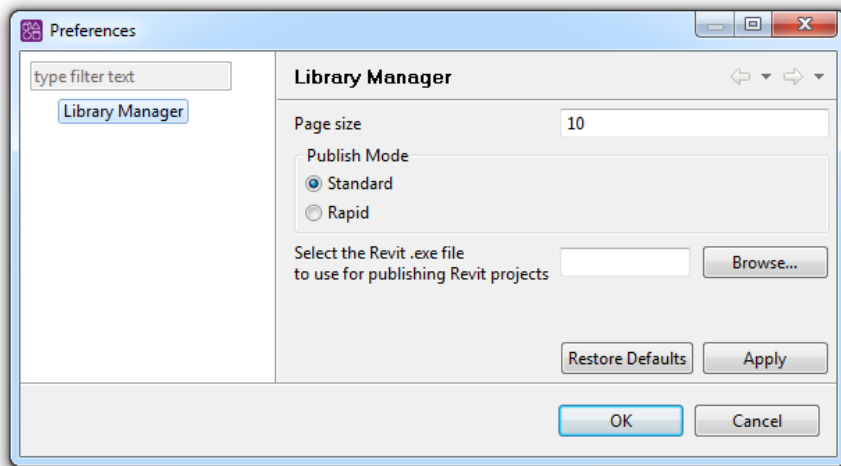
Option	Description
<i>Open SMARTBIM Catalog</i>	Opens the default <i>SMARTBIM Catalog</i> in the <i>Catalogs</i> pane. For more information, see Working with catalogs .
<i>New Catalog</i>	Use to create a new empty catalog. See Creating a new catalog for more information.
<i>Open Catalog</i>	Opens or closes one or more user-defined catalogs in the <i>Catalogs</i> pane. For more information, see Opening and closing catalogs .
<i>Close Catalog</i>	
<i>Advanced > Load Published Content</i>	Loads content published from Revit using the <i>Publish Families from Folder</i> option. Note: Workflows created in SMARTBIM Library Manager 3.2 are preserved using this option. See Publishing Catalogs for more information.
<i>Advanced > Clear Backup Files</i>	Cleans out the backup families from the deleted files folder. Note: When a family is deleted or overwritten in a user-defined catalog, a backup of the family is placed in a deleted files folder. The size of this folder will increase over time and therefore it is recommended that the <i>Clear Backup Files</i> command be part of periodic maintenance of the SMARTBIM Library Manager user defined catalogs. Note: If families were deleted unintentionally do NOT use the <i>Clear Backup Files</i> command. Please contact SMARTBIM Library Manager Customer Care for assistance in recovering these families.
<i>Exit</i>	Closes the SMARTBIM Library Manager application.

Using Window menu options

Clicking **Window** from the **SMARTBIM Library Manager** menu bar gives you access to the *Show Pane* and *Preferences* menu (and for SBL 4.0 only links to the *Autodesk Seek* web site).

The following table describes the *Window* menu options.

Option	Description
<i>Show Pane</i>	Allows you to select and open panes in the SMARTBIM Library Manager main workspace. The panes available are Attachments, Drop Pad, DWF, Guidelines, Catalogs, Properties, Search, and Thumbnails. For more information about using this feature, see Working with panes .
<i>Preferences</i>	Opens the <i>Preferences</i> menu:



The following describes how you can use the *Preferences* menu.

Field	Description
<i>Page size</i>	Use to set the number of items to display in the window any time the pagination buttons << < > >> are displayed at the top of a pane. Once you set the number to display, click Apply and then click OK . Ten is the default. Note: The settings take effect when you click <i>away</i> from the current view.
<i>Select the Revit .exe file...</i>	Use to set the type of Revit software (i.e. Revit Architecture, Revit Structural, or Revit MEP) to be used for publishing of .rvt files. Click Browse to select the Revit .exe file from the Windows browser, and then click 'OK.' Note: SBL will use Revit Architecture as the default program for publishing projects. If Revit Architecture is not installed SBL will use another available version of Revit.
<i>Restore Defaults</i>	Click to restore the system defaults for the menu. Click Apply and then click OK to select this option. Ten is the default for both settings.
<i>Family publishing increment (SBL 4.0 only)</i>	Use to set family publishing content increment levels. Ten is the default. Note: This feature is for SBL 4.0 only, see Using incremental family publishing for more information about setting publishing increment levels.
<i>Autodesk Seek (SBL 4.0 only)</i>	Opens the <i>Autodesk Seek</i> web site (http://seek.autodesk.com) in a separate browser window. This gives you access to additional product specifications and design files. Note: This feature is for SBL 4.0 only

Using Help menu options

Clicking **Help** from the **SMARTBIM Library Manager** menu bar gives you access to the following options:

- View the contents of the help system
- Visit the SMARTBIM site on the Web
- Enter a license or view product licensing information
- View the **SMARTBIM Library Manager** version and other application information.

The following table describes the *Help* menu options.

Option	Description
<i>Help Contents</i>	Opens the SMARTBIM Library Manager online help menu.
<i>SMARTBIM</i>	Opens a browser with the official SMARTBIM web site at http://www.smartbim.com . Updated regularly, the SMARTBIM web site allows you learn about new products, and download new content.
<i>License and Product Information</i>	Opens the <i>SMARTBIM Library Manager License</i> menu, allowing you to access licensing information for your copy of SMARTBIM Library Manager . See Activating SMARTBIM Library Manager and contacting your reseller for more information about using this menu.
<i>About SMARTBIM Library Manager</i>	Opens the <i>About SMARTBIM Library Manager</i> menu, which displays your current version and build of SMARTBIM Library Manager along with options for Feature Details, Plug-in Details, and Configuration Details.

SMARTBIM Library Manager

Working with panes

Related Help Topics

- [Working with panes](#)
- [Using the Attachments pane](#)
- [Using the Catalogs pane](#)
- [Using the Drop Pad pane](#)
- [Using the DWF pane](#)
- [Using the Guidelines pane](#)
- [Using the Properties pane](#)

The **SMARTBIM Library Manager** workspace is made of individual panes that you can adjust to suit your working needs. You can select the panes you want to view, adjust the location and size of how panes display, and move panes onto another monitor for systems with more than one display.

This section contains the following topics:

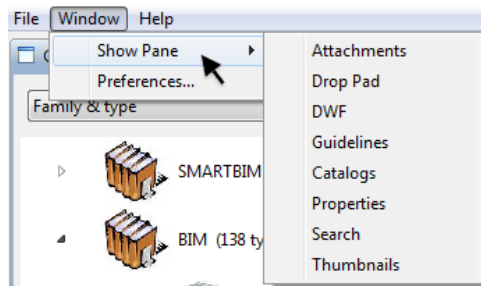
- [Opening panes](#)
- [Maximizing and minimizing panes](#)
- [Resizing panes](#)
- [Opening panes using the sidebar icons](#)
- [Moving panes](#)
- [Tips for moving panes](#)
- [Using the move command](#)
- [Detaching panes](#)
- [Moving panes on and off the workspace](#)

Opening panes

You can use the **Show Pane** command to both reopen a closed pane and to bring an open pane to the front of the viewable desktop as the *active* pane.

To open panes,

- 1 From the **SMARTBIM Library Manager** menu bar, click **Window** and then click **Show Pane**:



- 2 Click one of the following panes to view:

- [Attachments](#)
- [Drop Pad](#)
- [DWF](#)
- [Guidelines](#)
- [Catalog](#)
- [Properties](#)
- [Search](#)
- [Thumbnails](#)

Result: The selected pane is displayed in the **SMARTBIM Library Manager** window.

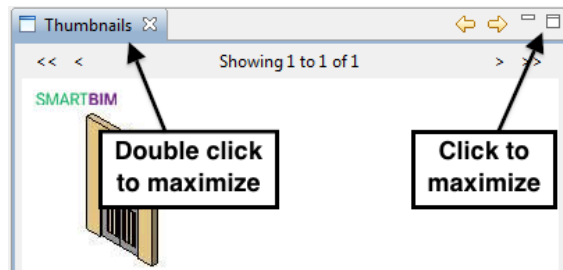
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Maximizing and minimizing panes

SMARTBIM Library Manager lets you maximize and minimize panes in your workspace.

Use the steps in the following table to maximize and minimize panes.

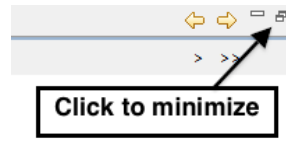
- 1 To maximize a pane,
 - click the **Maximize** icon at the top of the pane or
 - double-click the bar at the top of the pane



Result: The pane resizes to fill the window.

2 To minimize a pane,

- click the **Minimize** icon at the top of the pane:



or

- double-click the bar at the top of the pane:



Result: The pane minimizes, returning to its original size in the window.

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Resizing panes

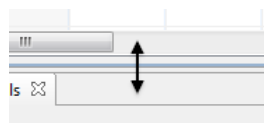
You can easily resize the horizontal and vertical dimension of any of the panes displayed in the **SMARTBIM Library Manager workspace**.

To resize the horizontal or vertical dimension of a pane,

- 1 Move your cursor to edge of the pane that you want to resize until the mouse pointer changes to a double-headed arrow:



or



- 2 Hold down the left mouse button and drag the pane to the desired size.

Result: The pane resizes to the desired size.

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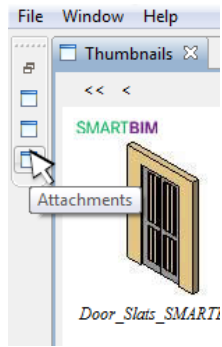
Opening panes using the sidebar icons

You can use the sidebar icons to open the *Properties*, *Drop Pad*, *DWF*, *Search*, and *Catalog* panes when you have one pane maximized in your window. The sidebar icons appear in the right or left side of the window, depending on how you have your workspace arranged. You can see the identity of the pane by hovering over the window icon.

Note: Use [Showing panes](#) to open previously closed panes.

To open panes using the sidebar icons,

- 1 On either the left or right side of the window, locate the sidebar icons:



Tip: Hover the mouse pointer over the window icon to see the name of the pane.

- 2 Click the window icon to open the pane.

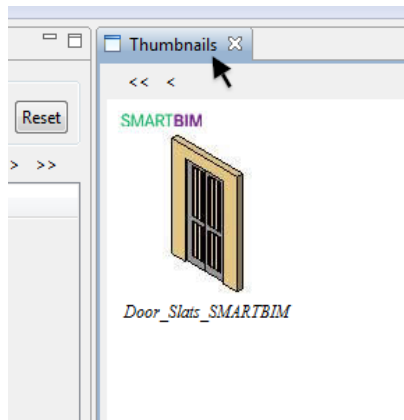
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Moving panes

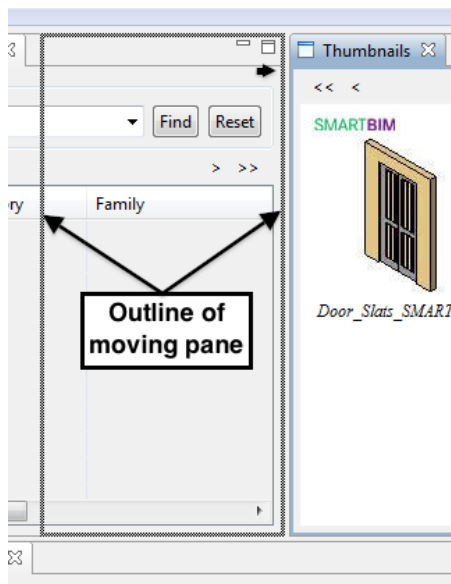
You can move panes both vertically and horizontally around the **SMARTBIM Library Manager** workspace to create a variety of working environments. Use the following steps as an overview of how to move panes around the **SMARTBIM Library Manager** workspace.

To move panes,

- 1 Place your mouse pointer on the pane tab that you want to move:



- 2 Click and hold down the left mouse button, dragging the pane to the location:



Note: When you drag a pane,

- an icon of floating file folders shows that you are dragging the pane
- a box outline of the moving pane shows the location of the moving pane.

3 Once the pane is in the new location, release the mouse button.

Result: The pane snaps into the new position.

Tips for moving panes

To help you understand how to effectively move panes to the desired location, use the following tips combined with the preceding steps to effectively move panes:

If you want a pane to be...	and...	Then drag the pane...
a full column spanning the workspace vertically	at the left or right edge of the workspace	all the way to the left or right of the workspace until the box outline appears vertically from top to bottom in the workspace.
	with one or more panes between it and the workspace edge	until the box outline is exactly in the desired position.
a full row spanning the workspace horizontally	at the top or bottom of the workspace	all the way to the top or bottom of the workspace until the box outline appears horizontally across the workspace.
	with one or more panes between it and the workspace edge	until the box outline is exactly in the desired position.
only part of a column or row	—	

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Using the move command

The *Move* command lets you move a single pane or all open panes to another location on the workspace, or to another monitor for systems with more than one display.

To use the *Move* command,

1 Choose from the following.

If want to...	Then click...	Result
move the pane currently displayed on the desktop	<ul style="list-style-type: none"> right click on the top of the pane click Move and then click View. 	The pane or panes detach from the workspace. You can drag the pane(s) to <ul style="list-style-type: none"> another location in the workspace to any location on your monitor, or to another monitor for systems with more than one display.
all open panes on the desktop	<ul style="list-style-type: none"> right click on the top of the pane click Move and then click Tab Groups. 	

2 To re-attach panes to the workspace, right-click on the pane tab and select **Detached**.

Result: The pane reattaches to the workspace to the right of all open panes.

Note: Reattached panes are inserted into the workspace at the far right side of the window. When you are re-attaching multiple panes, you must reattach each pane individually.

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Detaching panes

You can detach a pane from the **SMARTBIM Library Manager** workspace and move it to another location on your desktop, or to another monitor in a networked system.

To detach panes,

1 From the top of a pane, right-click and select **Detached**.

Result: The selected pane detaches from the **SMARTBIM Library Manager** window. You can drag the pane to any location on your monitor, or to another monitor in a networked system.

2 To reattach a pane, from the top of the detached pane, right-click **Detached**.

Result: The selected pane re-attaches to the **SMARTBIM Library Manager** window.

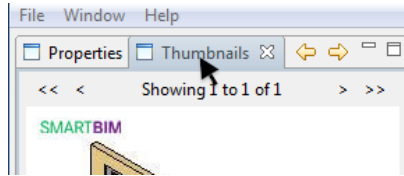
Note: Reattached panes are inserted into the workspace at the far right side of the window. When you are re-attaching multiple panes, you must reattach each pane individually.

Moving panes off and onto the workspace


You can move panes off the **SMARTBIM Library Manager** workspace and onto another location on your monitor or onto another monitor for systems with more than one display. You can choose to move a single pane or all open panes on your desktop.

To move panes,

- 1 Place your mouse pointer on the tab of the pane you want to move:



- 2 Select from the following to continue.

If you want to...	Then...
drag a pane to another location	Choose from the following. <ul style="list-style-type: none">• Holding down the left mouse button, drag the pane to the new location, either off the SMARTBIM Library Manager workspace or onto another monitor. <p>Note: The mouse pointer becomes a windowpane icon to let you know you are actively moving a pane off of the SMARTBIM Library Manager workspace:</p> 
detach a pane from the workspace	drag the pane to the new location, either off the SMARTBIM Library Manager workspace or onto another monitor.
detach all open panes from the workspace	

- 3 Once the pane is in the desired location, release the mouse button.

Result: The pane is moved to the new location.

- 4 To reattach the pane into the workspace, right-click on the tab you are moving and select **Detached**.

Result: The pane snaps back to the **SMARTBIM Library Manager** workspace.

Note: Reattached panes are inserted into the workspace at the far right side of the window. When you are re-attaching multiple panes, you must reattach each pane individually.

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SMARTBIM Library Manager

Using the Attachments pane

Related Help Topics

- [Working with panes](#)
- [Using the Attachments pane](#)
- [Using the Catalogs pane](#)
- [Using the Drop Pad pane](#)
- [Using the DWF pane](#)
- [Using the Guidelines pane](#)
- [Using the Properties pane](#)

The *Attachments* pane lets you see file information for attachments to families. You can also open attachments for editing using the *Attachments* pane.

Note: Attachments are not copied into **SMARTBIM Library Manager** catalog folders, but are only linked symbolically to the family. To avoid breaking links to attachments when moving catalog folders to another location,

- before moving the catalog folders, copy any attachments into a folder nested underneath the catalog root folder
- reestablish the attachment links once the folder is copied to the new location.

The following table describes how you can use the *Attachments* pane.

If you want to...	Then...
add attachments to a family	<ul style="list-style-type: none"> • select the category in the <i>Catalogs</i> pane to display the family for the attachment in the right side of the pane • on your desktop, open the folder containing the attachment file • drag and drop the attachment file over the <i>Family</i> icon <p>Result: The file is attached to the selected family and is displayed in the <i>Attachments</i> pane.</p>
remove an attachment from a family	<ul style="list-style-type: none"> • select the category in the <i>Catalogs</i> pane to display the family with the attachment in the right side of the pane. • open the <i>Attachments</i> pane to display the attachment to the family. • from the <i>Attachments</i> pane, click Detach. <p>Result: The attachment is removed from the family.</p>
see which families have attachments	<p>click on the thumbnail for a family in either the <i>Catalog</i> or <i>Thumbnails</i> pane. The <i>Attachments</i> pane displays the following data for any attachments to the object:</p> <ul style="list-style-type: none"> • file name and file type • size and • folder location.
see attachment information	
open and edit attachments	<p>double-click on the line for the attachment in the <i>Attachments</i> pane. The attachment opens on your desktop using the associated application.</p> <p>Note: You must have an application that can open the attachment file-type installed on your PC.</p>

SMARTBIM Library Manager

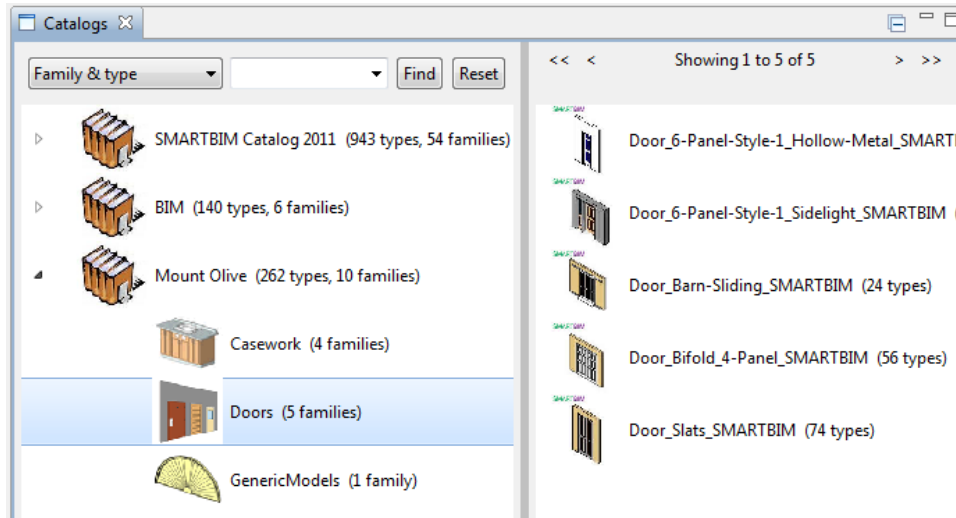
Using the Catalogs pane

Related Help Topics

- [Working with panes](#)
- [Using the Attachments pane](#)
- [Using the Catalogs pane](#)
- [Using the Drop Pad pane](#)
- [Using the DWF pane](#)
- [Using the Guidelines pane](#)
- [Using the Properties pane](#)

The *Catalogs* pane lets you perform a wide range of tasks, including opening catalogs, publishing *Revit* families into catalogs, and expanding the contents of catalogs to see a visual representation of the *Revit* families in a catalog.

The following is an example of the *Catalogs* pane showing the pane divided between *catalog/category* and *family/type* sections:



The left side of the *Catalogs* pane shows the catalogs and associated categories, including the number of families within each category.

Clicking to expand a catalog and then the nested category displays the associated family/type in the right-side of the pane.

The right side of the *Catalogs* pane shows the family types, including the number of types in each family. The family displayed in this section corresponds to the associated *catalog/category* selected in the left side of the pane.

You can use the arrows at the top of the pane to tab through the families in the pane.

Using the Catalogs pane

The following table describes the different options you have for using the *Catalogs* pane.

Option	Description
Loading catalogs	To load a catalog from an existing folder, you can drag and drop the catalog folder from the Windows Explorer window onto the <i>Catalogs</i> pane. Once complete, you can click on the catalog icon to display the the families in the catalog.
Using drag-and-drop publishing for <i>Revit</i> .rfa objects	You can publish one or all the families in a folder (and any nested folder) using drag and drop publishing. To drag-and-drop publish a <i>Revit</i> family from a folder, <ul style="list-style-type: none"> • in <i>Revit</i>, select Publish Mode from the SMARTBIM menu and drag-and-drop the family or folder of families over a catalog in the <i>Catalogs</i> pane or onto the <i>Drop Pad</i> pane. If you use the <i>Drop Pad</i> pane, you must select the catalog where you want to place the family. • The status bar tells you when the process is complete. See Family Content Publishing for more information.
Expanding catalogs	You can view the contents of catalogs by clicking the + next to the catalog icon, which opens the catalog to display: <ul style="list-style-type: none"> • all the categories in the catalog and • all the families and types displays all the categories in the catalog or family to expand the selected contents.
Searching catalogs	You can search the families in a catalog by family and type name, family type parameters, user-defined tags, and CSI 2004/2005 code numbers. For information, see Searching in SMARTBIM Library Manager .

SMARTBIM Library Manager

Using the Drop Pad pane

Related Help Topics

- [Working with panes](#)
- [Using the Attachments pane](#)
- [Using the Catalogs pane](#)
- [Using the Drop Pad pane](#)
- [Using the DWF pane](#)
- [Using the Guidelines pane](#)
- [Using the Properties pane](#)

The *Drop Pad* pane lets you quickly perform a variety of tasks associated with managing catalogs, including opening catalogs and publishing families from project folders, adding families to catalogs, adding attachments to families, and placing families into catalogs.

To use the *Drop Pad* pane, use the mouse to drag the item you want to work with over the top of the pane. When the icon changes to a plus + sign, release the object. **SMARTBIM Library Manager** provides you with the options to complete the action based on the object you are dropping.

Note: See [Publishing family content for catalogs](#) for using the *Publish Mode* feature in *Revit*.

The following table describes how you can use the *Drop Pad* pane.

If you want to...	Then...	Result
open a catalog	<ul style="list-style-type: none"> • open Windows Explorer to view the catalog folder • drag the catalog folder over to the <i>Drop Pad</i> pane. 	<p>The catalog opens and displays in the <i>Catalog</i> pane.</p> <p>Note: A message displays if the catalog is already open in the <i>Catalog</i> pane.</p>
publish families from a project	<ul style="list-style-type: none"> • start <i>Revit</i> and select Publish Mode from the SMARTBIM menu • open Windows Explorer to view the folder containing the <i>Revit</i> project file • drag the <i>Revit</i> project file to the <i>Drop Pad</i> pane • when prompted, select an existing folder or create a new folder as the target for <i>Revit</i> to save the project's published families <p>Note: An existing folder must be empty. New folders must follow the guidelines described in Creating a new catalog.</p> <ul style="list-style-type: none"> • click OK. 	<p><i>Drag-and-drop publishing</i> runs and the project is published in the selected folder.</p> <p>Note: The publishing process in <i>Revit</i> can stop if multiple users are using a single <i>Revit</i> project and the network links or linked files are broken or changed. See Exiting a stopped publishing process for more information.</p>
publish families from a folder	<ul style="list-style-type: none"> • start <i>Revit</i> and select Publish mode from the SMARTBIM menu • open Windows Explorer to view the folder containing the <i>Revit</i> .rfa objects • drag the folder to the <i>Drop Pad</i> pane <p>Note: The source folder can contain nested folders. New folders must follow the guidelines described in Creating a new catalog.</p> <ul style="list-style-type: none"> • click OK. 	<p><i>Drag-and-drop publishing</i> runs and the .rfa projects are published in the selected folder.</p>
move an .rfa object into a SMARTBIM Library Manager catalog	<ul style="list-style-type: none"> • start <i>Revit</i> and select Publish mode • open Windows Explorer to view the folder containing the .rfa object • in SMARTBIM Library Manager, open the user-defined catalog that is the destination for the object • drag the object to the <i>Drop Pad</i> pane • select the catalog for the object • click OK. 	<p><i>Drag-and-drop publishing</i> runs and the object is placed in the selected catalog.</p> <p>Note: A message is displayed if the object already exists in the catalog. You can choose to replace the object or cancel the operation.</p>

SMARTBIM Library Manager

Using the DWF pane

Related Help Topics

- [Working with panes](#)
- [Using the Attachments pane](#)
- [Using the Catalogs pane](#)
- [Using the Drop Pad pane](#)
- [Using the DWF pane](#)
- [Using the Guidelines pane](#)
- [Using the Properties pane](#)

The *Design Web Format* (DWF) pane embeds *Autodesk® Design Review* into **SMARTBIM Library Manager**, allowing you to display family objects in both 2D and 3D formats. Once an object is displayed in the DWF pane, you can use the *Autodesk Design Review* Help menu for assistance in manipulating the object.

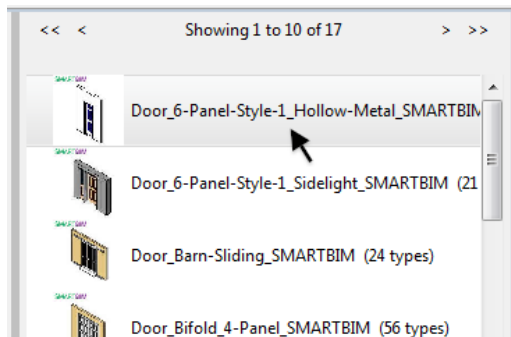
This section contains the following topics:

- [Viewing family types in the DWF pane](#)
- [Using the Autodesk help menu](#)
- [Using basic DWF navigation](#)

Viewing family types in the DWF pane

To view a family type in the DWF pane,

- 1 Click on a family in the *Catalogs* pane:



Result: The family is displayed in the *Thumbnails* pane.

- 2 Double-click on the family in either the
 - *Thumbnails* pane or the
 - *Catalogs* pane

Result: The family type is displayed in the *DWF* pane.

Using the Autodesk Design Review help menu

The Help menu for *Autodesk Design Review* contains a full description of using the DWF viewer.

To access the Help menu for the *Autodesk Design Review* feature, click on the **Home** tab on the menu bar and then pick on **Help** :



Tip: If the *Help* icon is not visible, right-click on the main toolbar and select **Panels > Assistance**.

Using basic DWF navigation

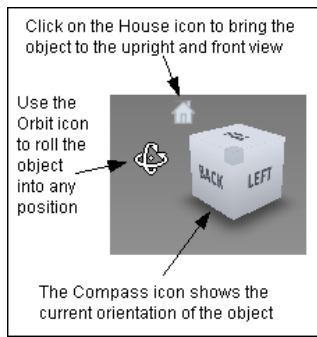
The basic DWF navigational tools let you maximize and move objects in any direction.

Maximizing to extents

To maximize an object, double-click on the object in either the *Catalogs* or the *Thumbnails* pane. The resulting image increases to the fullest extent of the *DWF* pane.

Moving an object

To move a object in the *DWF* pane, use the navigational tools in the upper right corner of the pane:



Note: When there is no DWF file available for an object, the message *DWF File Not Found* displays. Also, when a family is published using Rapid Publish Mode a DWF view is not generated and the DWF pane will display the message: *This family was **Rapid Published!** DWF is not generated when Rapid publishing.*

SMARTBIM Library Manager

Using the Guidelines pane

Related Help Topics

- [Working with panes](#)
- [Using the Attachments pane](#)
- [Using the Catalogs pane](#)
- [Using the Drop Pad pane](#)
- [Using the DWF pane](#)
- [Using the Guidelines pane](#)
- [Using the Properties pane](#)

The *Guidelines* pane provides modeling guideline information for the families in each *Revit* category used in **SMARTBIM Library Manager**. You can view the information for the category of the family you are currently using, or choose from an index of all categories. You can also use the *Guidelines* pane to suggest *Family* and *Type* name conventions based on a nodal naming pattern, as well as representative values for each node, and a worked example for each *Revit* category.

This section contains the following topics:

- [Viewing family guidelines](#)
- [Saving family guidelines](#)
- [Guidelines field descriptions](#)

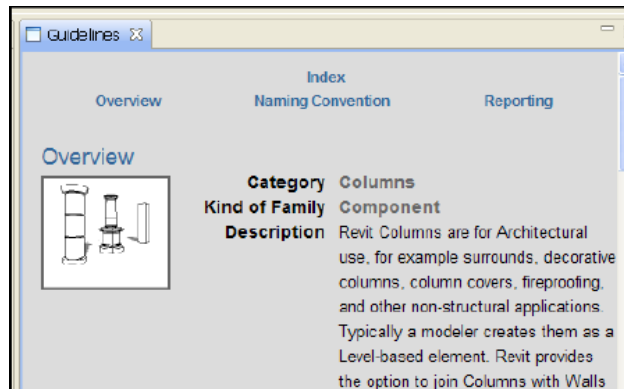
Viewing family guidelines

You can view family guidelines by selected a family in the *Catalogs* pane. The *Guidelines* pane displays the data for the selected family. You can also save family guidelines to a directory on your PC.

To view family guidelines,

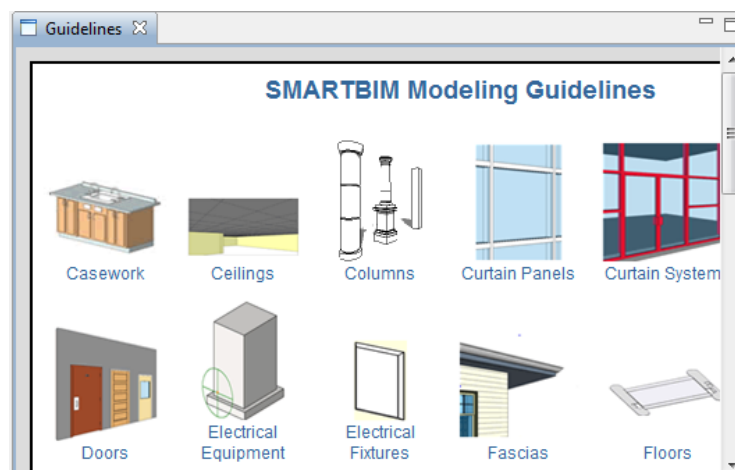
- 1 Open both the the *Catalogs* and *Guidelines* panes in the **SMARTBIM Library Manager** workspace.
- 2 From the *Catalog* pane, select a family.

Result: The guidelines for the selected category display in the *Guidelines* pane:



- 3 To view a list of available category guidelines, click **Index** from the guidelines display.

Result: An icon representing each catalog displays:



- 4 Click on any of the icons to display the modeling guidelines for the category.

Saving family guidelines

You can save family guidelines to a directory on your PC. This is helpful when you need to review the specifics of a family.

To save family guidelines,

1 Display the icon for the family guidelines you want to save in either the *Catalogs* or the *Thumbnails* pane.

2 Right-click on the family icon and select **Save guidelines page for <family name> to...**

Result: The *Select Output Directory* menu is displayed.

3 Select the directory for the guidelines page and click **OK**.

Result: The family guidelines are saved to the directory in .HTML format. Clicking on the file opens the guidelines for the family in a web browser.

Guidelines field descriptions

The sections in the *Guidelines* pane provide a comprehensive description of the elements for each category. The following table describes the information provided in the *Guidelines* pane.

Field	Description	
<i>Overview</i>	<i>Category</i>	The <i>Revit</i> category, such as <i>Doors</i> or <i>Windows</i> .
	<i>Kind of Family</i>	The general classification of the families that can be created within the category, either <i>System</i> or <i>Component</i> family. See <i>Revit</i> Help for definitions of <i>System</i> and <i>Component</i> families.
	<i>Description</i>	The description of the category, including construction uses, practical definitions and constraints, and ways to manipulate families created within the category in projects.
<i>Suggested Name Convention</i>	<i>Pattern</i>	The naming convention for families in the category. Use this convention when creating your own user-defined objects.
<i>Family Name Nodes and Typical Values</i>	Family name nodes represent distinct characteristics or properties of a family that describe and identify it. Typically, the node names correlate to how an architect or designer might select or specify key features of a product or assembly represented by the family. Some name nodes are common across all families and some others are distinct for a given kind of family. The nodes described in this section are representative examples. Please refer to the <i>Revit Guidelines</i> page for the nodes that SMARTBIM defines for each category.	
	<i>Kind-of-Element/Shape/Feature</i>	The kind of the element within the category, such as a <i>picture window</i> within the category <i>Window</i> .
	<i>Origin</i>	The developer / author organization of the family.
	<i>Application (Optional)</i>	The functional application of the family in the project, such as <i>picture window</i> can be used in an interior or exterior application.
	<i>Configuration (Optional)</i>	The practical configuration of the object, such as the number of sashes in a window and whether they are operable.
	<i>Identity and/or Model</i>	The SKU or other identification, make, or model information.
<i>Type Name Nodes and Typical Values</i>	<i>Dimension/Shape</i>	The dimensions of the family, such as height and width of a <i>picture window</i> .
	<i>Construction (Optional)</i>	The materials used in the construction of the family.
	<i>Finish and /or Options</i>	Optional value for the finish and other options for the element.
<i>Worked Examples</i>	<i>Family</i>	The family name for the family in the example.
	<i>Type</i>	The type name of the family in the example.
	<i>Complete Name</i>	The full name of the family in the example.
<i>Reporting</i>	<i>Revit Schedules</i>	A tabular display of the properties of families in a project. Provides useful information about which properties can be scheduled and in some cases should be added for quantity takeoff.
	<i>Quantity Take-Off</i>	A brief explanation of using SMARTBIM QTO Cost Check to determine project costs.

SMARTBIM Library Manager

Using the Properties pane

Related Help Topics

- [Working with panes](#)
- [Using the Attachments pane](#)
- [Using the Catalogs pane](#)
- [Using the Drop Pad pane](#)
- [Using the DWF pane](#)
- [Using the Guidelines pane](#)
- [Using the Properties pane](#)

The *Properties* pane provides a technical description of type property values for each family in a catalog.

To view type property descriptions, open a catalog in the [Catalogs pane](#) and then expand a category to show the individual families. Click on any family in the *Catalogs* or *Thumbnails* pane to display the individual type properties.

When using the *Properties* pane,

- scroll the tab at the bottom of the pane to see the values for each type
- drag the edge of a column heading to expand a column
- drag columns in the pane left or right to see side-by-side value comparisons.

The *Properties* pane displays all the available information for each type, including CSI and assembly codes and numbers, dimensions and finishes, manufacturers, costs, and BIM object author.

Note: You can search families for specific type property values using the Properties search feature, available from either the *Catalogs* pane or the *Search* pane. See [Searching properties](#) for more information.

Examples:

The following example shows a family with only one type:

Parameters	Cubicle
04 CSI	12 59 19
95 CSI	12730
Assembly Code	E2010200
Cost	
Default Elevation	0' - 0"
Description	
Frame Material	
Keynote	
Manufacturer	
Model	
Panel Material	
Shelf Height	4' - 0 15/16"
Shelf Material	
SmartBIM Object Created By	SMARTBIM, LLC
SmartBIM Object Version	3.000000
Subcategory	Office Furniture
Type Comments	
URL	
Worksurface Material	

The following example shows a family with multiple types:

Properties				
Bench-Science_SMARTBIM				
Parameters	60In x24In x36In	72In x24In x36In	84In x24In x36In	96In x24In x36In
04 CSI	12 30 00	12 30 00	12 30 00	12 30 00
95 CSI	12300	12300	12300	12300
Assembly Code	C1030400	C1030400	C1030400	C1030400
Cabinet				
Cabinet Surface				
Construction Type				
Cost				
Default Elevation	48"	48"	48"	48"
Depth	24	24	24	24
Description				
Finish				
Handle				
Height	36	36	36	36
Keynote				
L/R Cabinet Width	16"	16"	16"	16"
Manufacturer	SMARTBIM, LLC	SMARTBIM, LLC	SMARTBIM, LLC	SMARTBIM, LLC
Middle Cabinet Width	24"	24"	24"	24"

SMARTBIM Library Manager

Working with catalogs

Related Help Topics

- [User Interface Overview](#)
- [File, Window, and Help menus](#)
- [Working with panes](#)
- [Working with catalogs](#)
- [Working with families](#)
- [Searching in SMARTBIM Library Manager](#)
- [Working with references](#)
- [Working with tags](#)

Help Topics Available

- [Understanding catalogs](#)
- [Creating a new catalog](#)
- [Copying and moving catalog content](#)
- [Converting catalogs for Revit versions](#)
- [Opening and closing catalogs](#)
- [Renaming a catalog](#)
- [Working with references](#)
- [Updating catalogs](#)

SMARTBIM Library Manager

Understanding catalogs

Related Help Topics

- [Understanding Catalogs](#)
- [Creating a New Catalog](#)
- [Copying and Moving catalog content](#)
- [Converting catalogs for Revit versions](#)
- [Opening and closing catalogs](#)
- [Renaming a catalog](#)
- [Working with references](#)
- [Searching in SMARTBIM Library Manager](#)

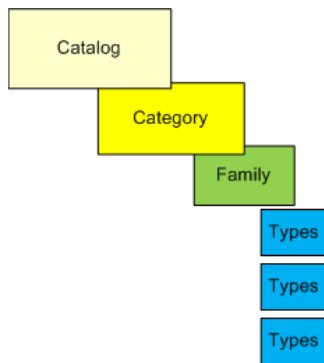
Catalog overview

The catalogs in **SMARTBIM Library Manager** contain a collection of BIM elements (*Revit* System and Component Families and Types) that you use to create projects in *Revit*. The *SMARTBIM Catalog* is the default catalog. You can import families into *User Defined Catalogs* by:

- copying or referencing families in the *SMARTBIM Catalog*
- copying, moving or referencing from other *User Defined Catalogs*
- publishing collections of *Revit* families within an existing *Windows* folder
- publishing all the families within an existing *Revit* project

Catalog hierarchy

Each catalog has a hierarchy of *Catalog > Category > Family > Type*. The following illustration shows the hierarchal organization of catalog elements in **SMARTBIM Library Manager**:



A *category* contains like elements, such as doors or windows, and within each family are a collection of *types*, such as different sizes and shapes of door or windows. You can have as many categories as you need inside of each user-defined catalog, and you can create as many catalogs as you need in **SMARTBIM Library Manager**.

Catalog types

There are two types of catalogs in **SMARTBIM Library Manager**, the default *SMARTBIM Catalog* and user-defined catalogs:

- The *SMARTBIM Catalog* is already installed when you first start **SMARTBIM Library Manager**. The catalog is automatically updated with new content. You can choose the content and download options for each update. You can use the *SMARTBIM Catalog* as the source of elements in your user-defined catalogs.
- *User-defined* catalogs lets you create customized catalogs with your exact specifications. You can create catalogs with project-specific elements, for separate phases of a project, or even sub-set catalogs inside of other catalogs. When you create a catalog, you can add elements from both the default *SMARTBIM Catalog* and from any other user-defined catalog.

You can move and copy content between user-defined catalogs. However, there are restrictions to moving and copying content with the *SMARTBIM Catalog*. See [Copying and moving catalog content](#) for more information.

SMARTBIM Library Manager

Creating a new catalog

Related Help Topics

- [Understanding catalogs](#)
- [Creating a new catalog](#)
- [Copying and moving catalog content](#)
- [Converting catalogs for Revit versions](#)
- [Opening and closing catalogs](#)
- [Renaming a catalog](#)
- [Inserting Families in Revit](#)

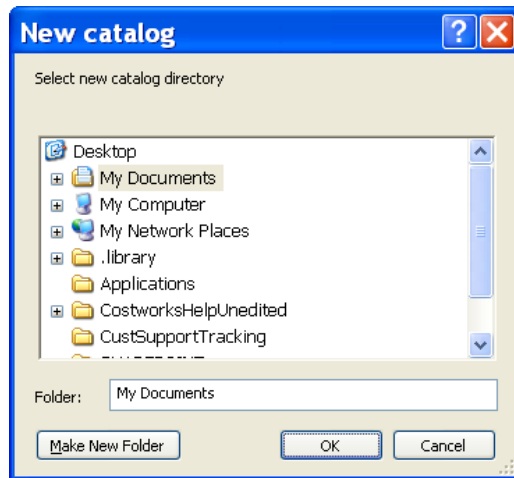
User-defined **SMARTBIM Library Manager** catalogs can be used for multiple purposes, such as grouping objects by theme or project types, temporary object storage, storage for approved objects, and for shared catalogs between multiple users in a network.

New catalogs created within **SMARTBIM Library Manager** initially have no content. You can add content to a new catalog from both the default *SMARTBIM Catalog* and any user-defined catalog. See [Copying and moving catalog content](#) for more information about adding content to new and existing user-defined catalogs.

To create a user-defined catalog,

- 1 From the **SMARTBIM Library Manager** main menu, click **File** and then click **New Catalog**.

Result: The *Select new catalog directory* menu is displayed:



- 2 The default location for new catalog folders is your *My Documents* directory. You can use this location or choose your own location.

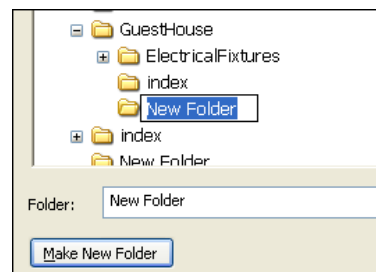
Note: There are restrictions on the locations where you can place **SMARTBIM Library Manager** catalogs. The following table describes the prohibited and semi-prohibited locations for catalog folders.

Prohibited locations at any level	Semi-prohibited locations valid at the <catalog_name> level
<ul style="list-style-type: none"> • C:\ • C:\Windows\ 	<ul style="list-style-type: none"> • C:\Program Files\<program li="" name>\catalog_name<=""> • C:\Documents and Settings\<folder_name>\<folder_name>\catalog_name< li=""> </folder_name>\<folder_name>\catalog_name<></program>

Do you want to use the default location?

- If **yes**, click **Make New Folder**.
- If **no**, and you want the catalog in another location, navigate to the directory where you want to place the new catalog and click **Make New Folder**.

Result: A new folder is displayed in the directory:



Tip: You may have to scroll down the list of files to see the new folder.

- 3 Type the name for the new folder and click **OK**.

Note: The name you give the folder is the name of the catalog.

Result: The catalog is created and appears in the *Catalogs* pane.

- 4 See [Copying and moving catalog content](#) for adding content to your new catalog.

SMARTBIM Library Manager

Copying and moving catalog content

Related Help Topics

- [Understanding Catalogs](#)
- [Creating a New Catalog](#)
- [Copying and Moving catalog content](#)
- [Converting catalogs for Revit versions](#)
- [Opening and closing catalogs](#)
- [Renaming a catalog](#)
- [Working with references](#)
- [Searching in SMARTBIM Library Manager](#)
- [Inserting Families in Revit](#)

About copying and moving content

You can *copy* and *move* content between catalogs in **SMARTBIM Library Manager**. There are distinct differences between *copying* and *moving* content. You must also make sure that your system has sufficient disk capacity to copy and move content.

Copying

The *copy* option allows you to copy content between catalogs. You can copy content from the **SMARTBIM Library Manager** default catalog into a user-defined catalog, or copy content from one user-defined catalog into another. You can even copy entire user-defined catalogs into another user-defined catalog. Copying *types*, however, isn't recommended because the associated *family* is copied along with the type into the destination catalog. Instead, copy the parent family when you want to move types. Also, copying *into* the **SMARTBIM Library Manager** default catalog is not allowed.

Moving

The *move* option allows you to remove content from one user-defined catalog and place it into another user-defined catalog. When you move content, the *source* material is deleted from its original location. Moving content can only be done between user-defined catalogs; moving content into and out of the **SMARTBIM Library Manager** default catalog is not allowed.

Disk space requirements

Both the copy and move command place duplicate *.rfa* files in your Recycle Bin. If there is insufficient space in your Recycle Bin, the move or copy command cannot finish. For best results, empty or delete files in your Recycle Bin before you move or copy content.

To copy or move content,

- 1 Open both the *source* and *destination* catalog in the *Catalog* pane.
Tip: If you are copying or moving families, click **+** next to the catalog to expand the view to the family and type level.
- 2 On the *source* catalog or family, **right-click** and select one of the following.

If you are...	Then click...	Result
copying content	copy and select the destination catalog.	The selected content is placed into the <i>destination</i> location.
moving content	move and select the destination catalog.	

Note: If the content already exists in the destination catalog, a message displays asking you if you want to cancel or overwrite the existing content.

- 3 Open the destination location and verify that the new content is correct.

SMARTBIM Library Manager

Converting catalogs for Revit versions

Related Help Topics

[Understanding Catalogs](#)

[Creating a New Catalog](#)

[Copying and Moving catalog content](#)

[Converting catalogs for Revit versions](#)

[Opening and closing catalogs](#)

[Renaming a catalog](#)

[Working with references](#)

[Searching in SMARTBIM Library Manager](#)

[Inserting Families in Revit](#)

When you upgrade to a newer version of *Revit*, families that were previously published in an earlier version of *Revit* do not need to be re-published. Objects are automatically converted when opened in a later version of *Revit*. However, *Revit* does a conversion process that can be time-consuming for very large catalogs. To speed this process, SMARTBIM recommends that you can use the batch scripts provided by Autodesk and SMARTBIM Library Manager to convert previously published families for use in later versions of *Revit*.

To convert families in user-defined catalogs for use with a later version of *Revit*,

- 1 Open the directory that contains the catalog folder that you are converting.
- 2 Create a new folder for the catalog using a different name than the original folder.
- 3 Copy the contents of the original folder to the new catalog folder.
- 4 Use the *Content Batch Upgrade* utility supplied by *Revit* to upgrade the families in the new catalog folder. The utility is installed as part of the *Revit* package and is located in the following file structure for Autodesk:

`C:\Autodesk\...\Utilities\Common\ContentBatchUtility`

Note: To use the utility, see the *ReadMe.txt* file instructions located in the utility folder.

- 5 Use the utility batch file, **SMARTBIMTouch.bat**, to update the .DWF, TXT, .JPG, and .XML files that the family publishing process creates in a catalog folder. By updating the files, SMARTBIM Library Manager will not try to update the catalog when you open it.

For SMARTBIM Library Manager 4.0 and prior versions, click http://files.smartbim.com.s3.amazonaws.com/support/smartbim_touch.zip to download and save **SMARTBIMTouch.bat** in the new catalog folder you created in [step 3](#). Unzip the download file to access **SMARTBIMTouch.bat**.

For SMARTBIM Library 4.2 (and 4.1), **SMARTBIMTouch.bat** is packaged in the folder:

`C:\Common Files\2010\SMARTBIM\Utilities\smartbim_touch.bat.`, for SMARTBIM 4.2 Library for Revit 2010 or;

`C:\Common Files\2011\SMARTBIM\Utilities\smartbim_touch.bat.` for SMARTBIM Library 4.2 for Revit 2011 or;

`C:\Common Files\2012\SMARTBIM\Utilities\smartbim_touch.bat.` for SMARTBIM Library 4.2 for Revit 2012 or;

- 6 Open the catalog folder where you saved the .BAT file. Click on the file to run the batch script.

Result: The batch script runs. The content published in the catalog folder for the (.txt, .dwf, .jpg and .xml) is updated so that when the catalog opens in SMARTBIM Library Manager, it is not necessary to Update the catalog content.

- 7 Return to [step 1](#) and repeat the procedure for each user-defined catalog you want to convert.

Result: The families residing in your user-defined catalogs are converted for use with your current version of *Revit*.

SMARTBIM Library Manager

Opening and closing catalogs

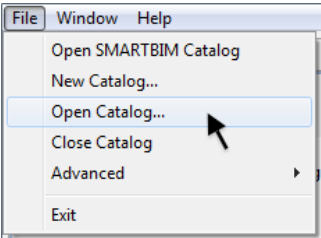
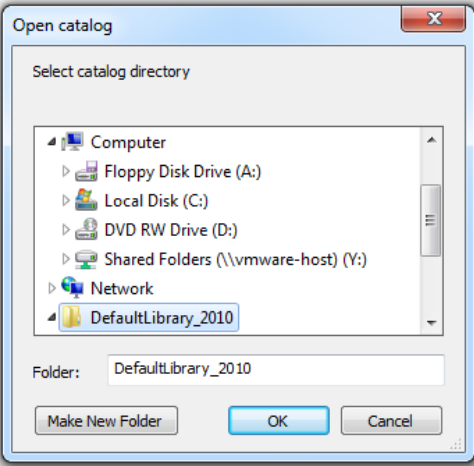
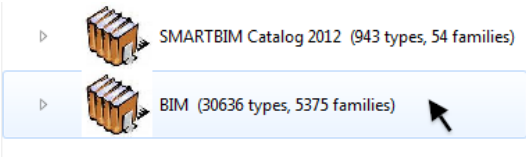
Related Help Topics

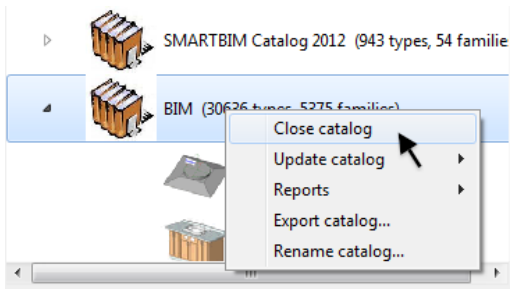
- [Understanding catalogs](#)
- [Creating a new catalog](#)
- [Copying and moving catalog content](#)
- [Converting catalogs for Revit versions](#)
- [Opening and closing catalogs](#)
- [Renaming a catalog](#)
- [Inserting Families in Revit](#)

You can open as many catalogs as you need when working in **SMARTBIM Library Manager**, and close catalogs not currently being used. Opening multiple catalogs gives you access to [moving and copying](#) content from one catalog to another. Each time you start **SMARTBIM Library Manager**, the catalogs open in your previous session are automatically re-opened in the *Catalogs* pane.

Note: For information about creating a new catalog, see [Creating a new catalog](#).

To open and close catalogs,

If you want to...	Then...
open a catalog	<p>1 From the SMARTBIM Library Manager main menu, click File and then click Open Catalog...</p>  <p>Result: The <i>Open catalog</i> menu is displayed:</p>  <p>2 Browse to locate the catalog and click OK.</p> <p>Result: The selected catalog opens in the <i>Catalogs</i> pane:</p>  <p>3 Repeat steps 1 and 2 for each catalog you want to open.</p>
close a catalog	<p>1 Select the catalog you want to close from the <i>Catalogs</i> pane.</p> <p>2 Right click on the catalog.</p> <p>Result: An options menu is displayed:</p>



3 Click **Close catalog**.

Result: The selected catalog closes and is no longer displayed in the *Catalogs* pane.

SMARTBIM Library Manager

Renaming a catalog

Related Help Topics

[Creating a New Catalog](#)

[Copying and Moving catalog content](#)

[Converting catalogs for Revit versions](#)

[Opening and closing catalogs](#)

[Renaming a catalog](#)

[Working with references](#)

[Searching in SMARTBIM Library Manager](#)

[Inserting Families in Revit](#)

You can rename any user-defined catalog in **SMARTBIM Library Manager** from the *Catalogs* pane.

To rename a catalog,

- 1 Locate the catalog you want to rename in the *Catalogs* pane.
- 2 Place the cursor over the catalog icon and **right-click** and select **Rename catalog...**

Result: The *Rename <name> Catalog* window is displayed.

- 3 Type the new name for the catalog and click **OK**.

Result: The catalog is renamed and the new name is displayed in the *Catalogs* pane.

SMARTBIM Library Manager

Inserting Families in Revit

Related Help Topics

[Creating a New Catalog](#)[Copying and Moving catalog content](#)[Converting catalogs for Revit versions](#)[Opening and closing catalogs](#)[Renaming a catalog](#)[Working with references](#)[Searching in SMARTBIM Library Manager](#)[Inserting Families in Revit](#)

Inserting families in a Revit project

You can drag and drop a **SMARTBIM Library Manager** object from the *Catalogs* pane or *Thumbnail* pane directly onto your Revit project. To insert family objects in a Revit project,

- 1 Start both **SMARTBIM Library Manager** and *Revit*.
- 2 From *Revit*, open the project to the view in which you want to place the object.
- 3 Drag the object from the *Catalog* pane or *Thumbnail* pane to your *Revit* project, releasing the mouse button to drop the object in Revit project view.

Result: The object is inserted into the project.

SMARTBIM Library Manager

Working with families

Related Help Topics

- [File, Window, and Help menus](#)
- [Working with panes](#)
- [Working with catalogs](#)
- [Working with families](#)
- [Searching in SMARTBIM Library Manager](#)
- [Working with references](#)
- [Working with tags](#)
- [Inserting Families in Revit](#)

Help Topics Available

- [Saving family guidelines and types](#)
- [Deleting families](#)



Saving family guidelines and types

Related Help Topics

[Saving family guidelines and types](#)

[Deleting families](#)

Saving family modeling guidelines

Each family is made of components that are common to all the associated *types* within the family. These are the modeling guidelines, and each family is defined with a specific set of modeling guidelines. You can save modeling guidelines for each family as an .HTML file for future reference.

To save family modeling guidelines,

- 1 Place the cursor over a *Family* icon and right-click to display the options menu.
- 2 Click **Save guidelines page for <family name> to...**
Result: The *Save As* menu displays.
- 3 Select an existing folder or create a new folder.
- 4 Click **OK**.
Result: The guidelines information saves as an .HTML file.
- 5 Double click on the file to open it as an .HTML page.

Saving types as .rfa files

Revit uses *.rfa* files to create project elements. You can save family *type* objects with the *.rfa* file extension for use with Revit projects.

To save *types* as *.rfa* files,

- 1 Place the cursor over a *Type* icon and right-click to display the options menu.
- 2 Click **Save family files for <type name>**.
Result: The *Save As* menu displays.
- 3 Select an existing folder or create a new folder.
- 4 Click **OK**.
Result: The *type* file is saved in *.rfa* format.
- 5 Double-click the file to it open in Revit.

SMARTBIM Library Manager

Deleting families

Related Help Topics

[Saving family guidelines and types](#)[Deleting families](#)

You can delete families from any user-defined catalog in **SMARTBIM Library Manager**. When you delete a family, any types nested inside of the family are also deleted, including any attachments. For *referenced* families, deleting the *source* or resident family also removes the virtual or *referenced* copy, including any referenced attachments. You must be careful when deleting families to avoid accidentally deleting any referenced families and their attachments.

Note: You cannot delete families from the default *SMARTBIM Catalog*.

To delete a family,

- 1 From the *Catalogs* pane, click the category to display the family you are deleting in the right side of the pane.
- 2 On the icon representing the family you are deleting, right-click and select **Delete**.

Result: The *Delete Family* message is displayed asking you to confirm your selection.

Note: The warning message displays the name and location of any referenced copies of the family.

- 3 Click **OK** to remove the family.

Result: The family and any referenced copies and attachments are deleted from the catalog.

SMARTBIM Library Manager

Searching in SMARTBIM Library Manager

Related Help Topics

- [File, Window, and Help menus](#)
- [Working with panes](#)
- [Working with catalogs](#)
- [Working with families](#)
- [Searching in SMARTBIM Library Manager](#)
- [Working with references](#)
- [Working with tags](#)
- [Inserting Families in Revit](#)

Help Topics Available

- [Searching Categories](#) *(New in v4.1/v4.2)*
- [Searching family and type names](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching CSI 2004 codes](#)
- [Searching Unifomat codes](#) *(New in v4.1/v4.2)*
- [Searching Omniclass codes](#) *(New in v4.1/v4.2)*

SMARTBIM Library Manager

Searching categories

Related Help Topics

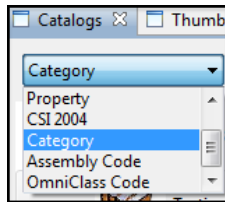
- [Searching categories](#)
- [Searching family and type names](#)
- [Searching CSI 2004 codes](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching Unifomat Assembly codes](#)
- [Searching Omniclass codes](#)

You can search by Revit category across catalogs in **SMARTBIM Library Manager**. You can perform a category search from

- the *Catalog* pane to visually see the results, or
- the *Search* pane to see text-based results.

To perform a category search,

- 1 From the search menu on the *Catalog* pane, click the drop-down list and select **Category**:



- 2 In the search box, type the Revit category you want to locate.
- 3 Click **Find**.

Result: Your search results display

- as icons representing the object in the *Catalog* pane or
- as a text description in the *Properties* pane.

Notes:

- All catalogs currently open in the *Catalog* pane are searched.
- Partial searches and wildcard searches are not supported.

- 4 To clear the results and reset the window after searching, click **Reset**.

SMARTBIM Library Manager

Searching family and type names

Related Help Topics

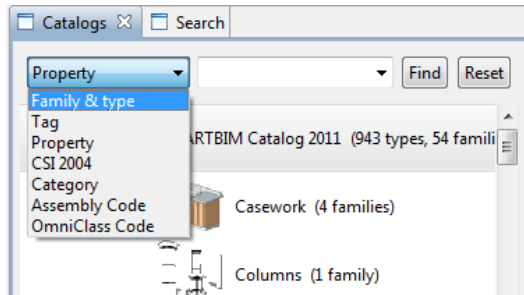
- [Searching categories](#)
- [Searching family and type names](#)
- [Searching CSI 2004 codes](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching Unifomat Assembly codes](#)
- [Searching Omniclass codes](#)

The *Family & type* search locates objects at the family and type level, and is useful for performing a search using general terms, such as *window* or *door*. You can also search by manufacturer name for the maker of a specific product. The *Family & type* search looks for matches in all catalogs currently open in the *Catalog* pane.

Tip: You can use multiple words in your search. However, your search results can include one or more of the search words. Searching with "garage" and "door" returns results that include cabinets with doors, shower stalls with doors, exterior doors, along with variations of "garage."

To perform a *Family & type* search,

- 1 Open the catalogs you want to search in the *Catalogs* pane.
- 2 From either the *Catalogs* or the *Search* pane, use the drop-down list next to the search box and select **Family & type**:



- 3 Type the search term in the box and click **Find**.

Result: Choose from the following for your results.

If you searched from the...	Then your results display as...
<i>Catalogs</i> pane	thumbnails in the pane. Click to expand the categories to see the full results.
<i>Search</i> pane	text entries for each item. Note: Double-click on an item's listing to display the object in the <i>Thumbnails</i> and <i>DWF</i> panes.

To search for a different term, click **Reset** to clear the search box before entering the new term.

SMARTBIM Library Manager

Searching CSI 2004 codes

Related Help Topics

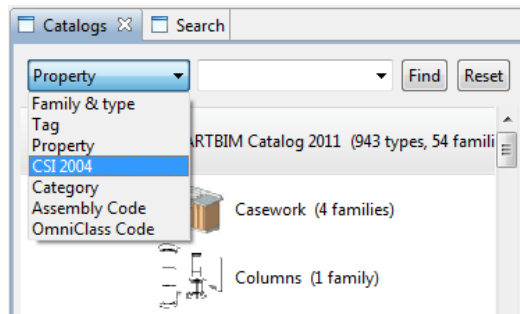
- [Searching categories](#)
- [Searching family and type names](#)
- [Searching CSI 2004 codes](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching Unifomat Assembly codes](#)
- [Searching Omniclass codes](#)

You can search **SMARTBIM Library Manager** for objects published by SMARTBIM LLC. using Construction Specifications Institute 2004 (CSI 2004) codes. You can perform a CSI 2004 search from

- the *Catalog* pane to visually see the results, or
- the *Search* pane to see text-based results.

To perform a CSI 2004 search,

- 1 From the search menu on the *Catalog* pane, click the drop-down list and select **CSI 2004**:



- 2 In the search box, type the CSI code for the object you want to locate, removing all spaces between the pairs of numbers.

- 3 Click **Find**.

Result: Your search results display

- as icons representing the object in the *Catalog* pane or
- as a text description in the *Properties* pane.

Notes:

- All catalogs currently open in the *Catalog* pane are searched.
- Partial searches and wildcard searches are not supported.

- 4 To clear the results and reset the window after searching, click **Reset**.

SMARTBIM Library Manager

Searching object properties

Related Help Topics

- [Searching categories](#)
- [Searching family and type names](#)
- [Searching CSI 2004 codes](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching Unifomat Assembly codes](#)
- [Searching Omniclass codes](#)

Properties are any measurable attribute for objects in **SMARTBIM Library Manager** and are defined in detail in the *Properties* pane. The *Properties* search queries the open catalogs displayed in the *Catalog* pane.

The *Property* search lets you locate objects using a combination of a property and a value as described in the *Properties* pane.

- A *property*, also called a *parameter*, can be a dimension, the angle of a door swing, manufacturer, cost, or other measurable aspect of an object.
- A *value* can be a measurement, a type of wood, a model number, or any other value associated with an object. A property describes what can be measured, which is the property *value*.

When you perform a *Property* search,

- remove all spaces from the property and its value
- include all of the letters, numbers and characters as displayed in the *Properties* pane
- partial matches do not display in the search results
- wildcard searches are not supported
- be sure to specify 04CSI or 95CSI when searching for CSI codes

Note: It is recommended that you use the *CSI 2004* search feature for all CSI 2004 searches.

To search for objects by property and value,

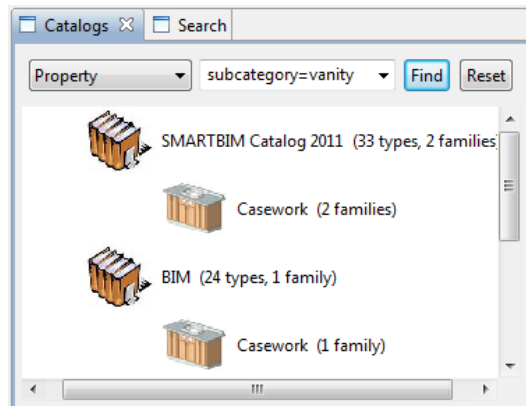
- 1 From the search bar on the *Catalog* or the *Search* panes, select **Property**.
- 2 Type the property and the value you want to use in your search. Make sure you remove all spaces from the property and the value, but be sure to include all letters, numbers and characters.

Example: screenbase=stainlesssteel,matte

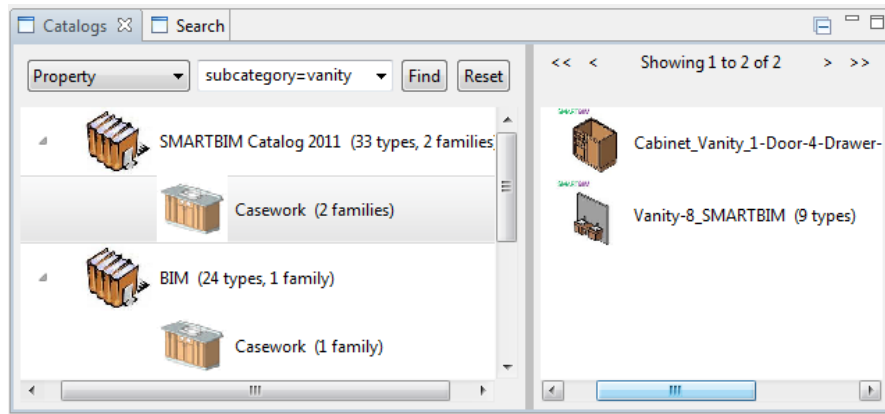
The above example searches for a property and value combination of a screen base made of stainless steel with a matte finish:

- 3 Click **Find**.

Result: All of the categories containing matching objects display in the *Catalog* pane:



- 4 Click the category to display the families with the matching property value.



5 Click **Reset** to clear the search.

SMARTBIM Library Manager

Searching tags

Related Help Topics

- [Searching categories](#)
- [Searching family and type names](#)
- [Searching CSI 2004 codes](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching Unifomat Assembly codes](#)
- [Searching Omniclass codes](#)

Tags are names you give to objects in the **SMARTBIM Library Manager** catalog to help you locate objects marked for a specific purpose. You can search on tags from either the *Catalog* or the *Search* panes.

Note: See [Working with tags](#) more information about adding and viewing family tags.

To search objects using tags,

- 1 From either the *Catalog* or *Search* pane, use the drop-down list on the search menu and select **Tag**.
- 2 Type the tag name for the object and click **Find**.

Tip: You can type multiple tag names in one search to find objects with each tag name. The example search using **wall ceiling hospital** returns objects tagged *wall* and *ceiling* and *hospital*.

Result: The catalogs containing the matching objects open to the category and object containing the matching term.

For Microsoft Vista and Windows 7 operating systems, *User Account Control* settings can prevent tag values from being saved, and therefore prevent searching by tags. Please see [Disabling Vista and Windows 7 UAC controls](#).

SMARTBIM Library Manager

Searching Uniformat Assembly Codes

Related Help Topics

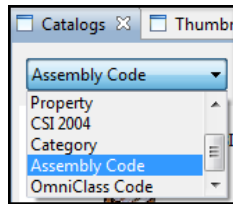
- [Searching categories](#)
- [Searching family and type names](#)
- [Searching CSI 2004 codes](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching Uniformat Assembly codes](#)
- [Searching Omniclass codes](#)

You can search **SMARTBIM Library Manager** objects by Uniformat Assembly codes, using the Assembly codes provided with Revit. You can perform an Assembly code search from:

- the *Catalog* pane to visually see the results, or
- the *Search* pane to see text-based results.

To perform an Assembly code search,

- 1 From the search menu on the *Catalog* pane, click the drop-down list and select **Assembly Code**:



- 2 In the search box, type the Assembly code for the object you want to locate. There should be no spaces in the code.
- 3 Click **Find**.

Result: Your search results display

- as icons representing the object in the *Catalog* pane or
- as a text description in the *Properties* pane.

Notes:

- All catalogs currently open in the *Catalog* pane are searched.
- Partial searches and wildcard searches are not supported.

- 4 To clear the results and reset the window after searching, click **Reset**.

SMARTBIM Library Manager

Searching Omniclass codes

Related Help Topics

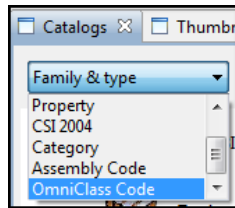
- [Searching categories](#)
- [Searching family and type names](#)
- [Searching CSI 2004 codes](#)
- [Searching object properties](#)
- [Searching tags](#)
- [Searching Unifomat Assembly codes](#)
- [Searching Omniclass codes](#)

You can search **SMARTBIM Library Manager** objects by Omniclass codes, using the Omniclass codes provided with Revit. You can perform an Omniclass code search from

- the *Catalog* pane to visually see the results, or
- the *Search* pane to see text-based results.

To perform an Omniclass code search,

- 1 From the search menu on the *Catalog* pane, click the drop-down list and select **Omniclass Code**:



- 2 In the search box, type the Omniclass code for the object you want to locate, removing all spaces between the pairs of numbers.

- 3 Click **Find**.

Result: Your search results display

- as icons representing the object in the *Catalog* pane or
- as a text description in the *Properties* pane.

Notes:

- All catalogs currently open in the *Catalog* pane are searched.
- Partial searches and wildcard searches are not supported.

- 4 To clear the results and reset the window after searching, click **Reset**.

SMARTBIM Library Manager

Working with references

Related Help Topics

- [Using menu bar options](#)
- [Working with panes](#)
- [Working with catalogs](#)
- [Working with families](#)
- [Searching in SMARTBIM Library Manager](#)
- [Working with references](#)
- [Working with tags](#)
- [Inserting Families in Revit](#)

The *Create Reference In* feature lets you place virtual copies of families into user-defined catalogs. The referenced family is always in the *SMARTBIM Catalog*, so that your referenced families are updated when you update the default catalog. You can use referenced families to save space on your system and speed both the updating and content publishing processes. For easy identification, referenced families appear *italicized* in the window for easy visual identification.

You can reference families *from* any level:

- *Catalog* — references all families in the catalog
- *Category* — references all families in that category
- *Family* — references just that family

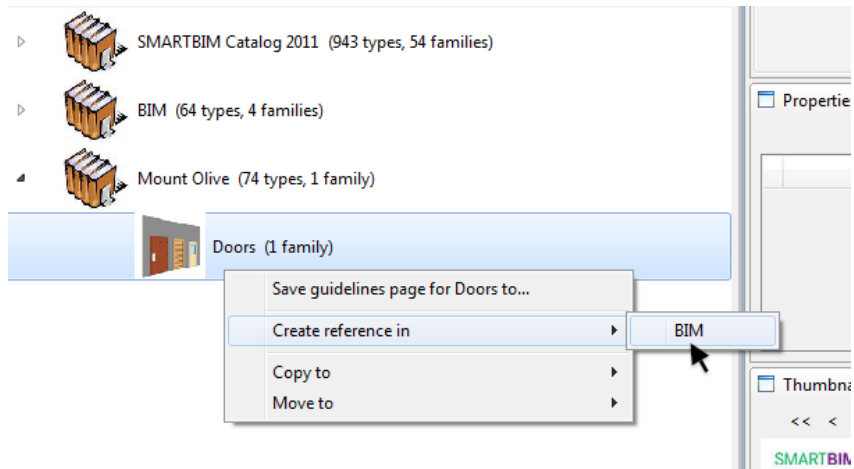
When referencing families:

- you can reference *from* both the *SMARTBIM Catalog* and any user-defined catalog (the original *Catalog* is always the source catalog)
- you can reference families *into* any user-defined catalog (but not the *SMARTBIM Catalog*)
- the destination catalog must be open in **SMARTBIM Library Manager**
- referencing a single *Family* also creates a virtual reference to the associated *Category*

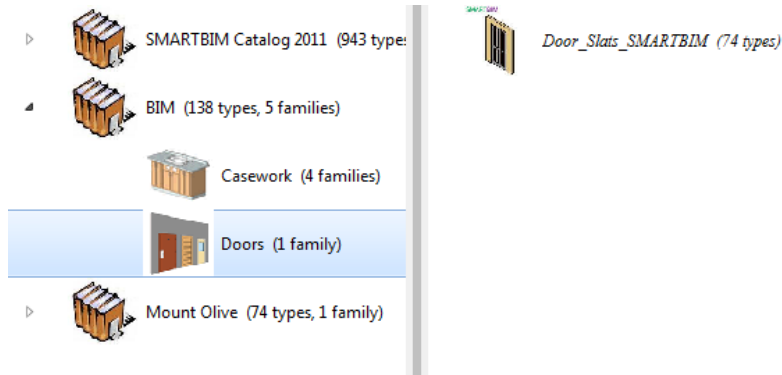
To use the *Create Reference In* feature:

- 1 Open the *source* catalog, which can be the *SMARTBIM Catalog* or any user-defined catalog.
- 2 Open the *destination* catalog, which must be a user-defined catalog (not the *SMARTBIM Catalog*).
- 3 Select the *source* to reference, which can be one of the following:
 - *Catalog*
 - *Category*
 - *Family*
 - *Type*
- 4 On the *source* object icon, right-click and select **Create Reference In...** and then select the destination catalog.

The following example shows a three-family category selected for reference:



Result: A virtual copy of the selected family and related types is placed in the destination catalog, as shown in the following example:



Note: In the above example, the Door family is virtual and identified in *italics*.

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SMARTBIM Library Manager

Working with tags

Related Help Topics

- File, Window, and Help menus
- Working with panes
- Working with catalogs
- Working with families
- Searching in SMARTBIM Library Manager
- Working with references
- Working with tags
- Inserting Families in Revit

Tags

You can add tags to families in any catalog to help you in organizing and searching your project objects.

Tags are any words, letters, or numbers that you assign to objects for use in performing searches. Tags can be common words to group objects together, identify elements of a project or project phase.

For example, the tag "hospital" can be used to identify all objects used in hospital design, and the tag "northhospital" to identify the objects in a particular hospital project. Search for the tags "hospital" or "northhospital" to locate the objects tagged with the specific notation.

Tags in referenced families are controlled by the source family. You can only add or edit a tag in the source family, not the virtual family.

Note: To locate tags you have already added to families, use the steps described in [Searching tags](#).

This section contains the following topics:

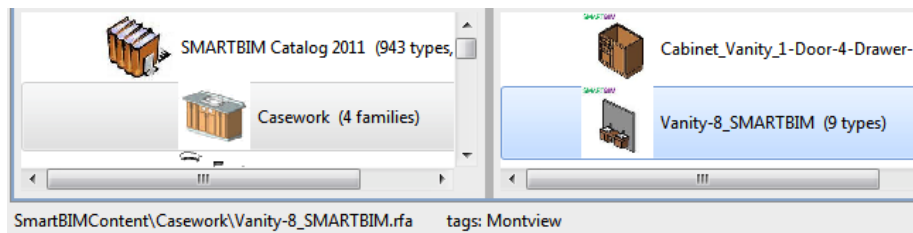
- [Viewing tags](#)
- [Adding tags](#)

Viewing tags

You can view tags added to families using one of the following methods:

From either the *Catalogs* or *Thumbnails* pane,

- right-click on the family and select **Tags...** to display the tag name, or
- click on the family to display the file information, including any tag name, at the bottom of the window:



Adding tags

To add tags to families,

- 1 In the *Catalogs* or the *Thumbnails* pane, right-click the object that you want to tag and select **Tags...**

Result: The *Edit tags* menu is displayed.

Note: Referenced families only display the *View tags* menu showing the tag name. You can only add or edit tags from a resident family, not from a referenced family.

- 2 Type the tag text in the box.

Note: Tags can be any words, space or comma separated, and upper and lower case letters A to Z and numbers 0 to 9.

- 3 Click **OK**.

Result: The tag is added

- 4 Make a note of this and all other tags you create for future reference.

For Microsoft Vista and Windows 7 operating systems, *User Account Control* settings can prevent tag values from being saved, and therefore prevent searching by tags. Please see [Disabling Vista and Windows 7 UAC controls](#).

SMARTBIM Library Manager

Publishing catalogs

Related Help Topics

[Welcome to SMARTBIM Library Manager Online Help](#)

[Getting started](#)

[Using SMARTBIM Library Manager](#)

[Publishing catalogs](#)

[Downloading content updates](#)

[Contacting SMARTBIM Library Manager Customer Care](#)

Help Topics Available

- [Family Content Publishing](#)
- [Standard and Rapid publish modes *\(New in v4.1/v4.2\)*](#)
- [Publishing from a project](#)
- [Publishing from a folder](#)
- [Updating Catalogs](#)

SMARTBIM Library Manager

Family Content Publishing

Related Help Topics

- [Family Content Publishing](#)
- [Standard and Rapid Publish modes](#)
- [Publishing from a folder](#)
- [Publishing from a project](#)
- [Updating Catalogs](#)

What is Family Content Publishing (FCP)?

Family Content Publishing (FCP) uses *Revit* as a dedicated batch processor to extract data from *Revit* families.

The *Family Content Publishing (FCP)* tool extracts the following data from *Revit* family (.rfa) files to be displayed within user-defined catalogs in **SMARTBIM Library Manager**:

- the *Revit* category
- family name and types
- type properties
- thumbnail image (.jpg)
- the DWF model

The *Revit* family (.rfa) files can be published into a new or existing user-defined catalog from either a folder on the Windows file system or a *Revit* project. See [Publishing from a folder](#) and [Publishing from a project](#) for more information.

This section contains the following topics:

- [Important file processing information](#)
- [User Logs](#)
- [Incremental family publishing](#)
- [Restarting the publishing process](#)
- [Restoring catalog names after a system failure](#)

Important file processing information

- **Memory management issues in *Revit*** - During the publishing process, it is recommended that you publish the content of very large folders in incremental batches. This reduces the possibility of *Revit* slowing or stopping while processing extremely large volumes of files.
- **Preserving content folders** - The family publishing process creates two sub-folders within the *Catalog* folder:
 - *Reserved for SMARTBIM* - Contains information published from families; the .dwf model, thumbnail image, family category, name, type, and property data.
 - *SMARTBIM Content* - Contains families (.rfa) that are copied into the catalog folder from a source folder when you add families to an existing catalog.

The default view setting for these folders is *hidden*. Unless absolutely necessary, do not move or delete these files from your system. If they are deleted or moved, the catalogs will appear empty in **SMARTBIM Library Manager** and you will need to replace or re-publish the catalog content.

User logs

Family Content Publishing for **SMARTBIM Library Manager** version 4.1 only, creates user log files that track the publishing time, total number of families to be published, families that successfully published and families that failed to publish. The user logs are text files that are generated each time a publishing session is invoked. The most recent user log is named "*publishing.log*", while earlier log files are renamed with a corresponding date/time stamp suffix. The current and past user logs can be found in the following directory:

C:\Common Files\2011\SmartBIM\logs\userlogs

We recommend that a shortcut to this folder is added to the Desktop for easy access to the user log files.

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Incremental family publishing

SMARTBIM Library Manager version 4.1 simplifies and automates the process of incremental family publishing by allowing publishing to restart after the last successfully published family, see [Restarting the publishing process](#).

For **SMARTBIM Library Manager** version 4.0 only, the *Family Publishing Increment* value lets you set the number of families processed at one time. This optimizes FCP processing and avoids any issues arising from resource constraints in *Revit*.

To use incremental family publishing (**SMARTBIM Library Manager** version 4.0 only),

- 1 From **SMARTBIM Library Manager**, click **Window** and then click **Preferences** to display the *Preferences* menu.
- 2 In the box for *Family Publishing Increment*, enter the number of families to process at one time.

Tip: Divide the number of families you are publishing into even groups. You can select from a range of 1 to 1000.

- 3 Click **Apply** and then click **OK**.

Result: **SMARTBIM Library Manager** is now set to publish families in the increments you selected.

Note: Repeat the above steps at any time to reset FCP processing increments.

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Restarting the publishing process

In the event that *Revit* interrupts publishing and FCP only publishes a portion of the catalog, restart *Revit* and restart the publishing process.

To restart the publishing process,

- 1 Restart both **SMARTBIM Library Manager** and *Revit*.
- 2 From *Revit*, select **Publish Mode** under the **SMARTBIM Library Manager Add-ins** menu.
- 3 From **SMARTBIM Library Manager**, open the *Catalogs* pane to display the catalog that you want to continue publishing.
- 4 Right-click on the catalog folder and select **Update Catalog/Publish New Families**.
- 5 **Result:** The remaining unpublished and updated families are published in the catalog

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Restoring type catalog names after a system failure

FCP avoids the time consuming process of *Revit* opening each type catalog by opening the files directly in **SMARTBIM Library Manager**. Since *Revit* opens these files automatically **SMARTBIM Library Manager** renames the type catalog files temporarily.

In the event that the FCP is halted by either a PC crash or **SMARTBIM Library Manager** and *Revit* failing concurrently, the type catalogs in the folder being published may be renamed with the incorrect extension *.sbltvc*. In order to use these catalogs again, you must restore the correct extension *.txt* to the type catalog files.

To restore type catalog filename extensions,

- 1 Once you have recovered your system, locate the folder where the type catalogs for the project are stored.
- 2 For each type catalog with the filename extension *.sbltvc*, change the extension to *.txt*.
- 3 You can now safely restart the publishing process.

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SMARTBIM Library Manager

Standard and Rapid Publish modes

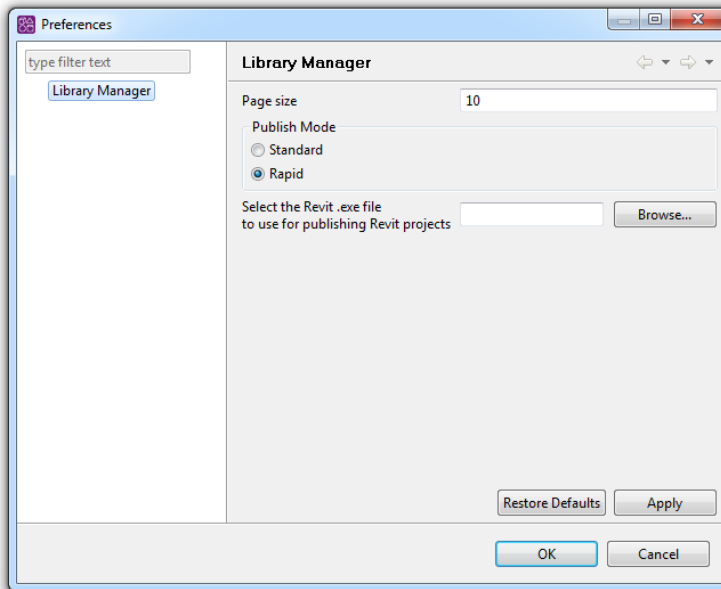
Related Help Topics

- [Family Content Publishing](#)
- [Standard and Rapid Publish modes](#)
- [Publishing from a folder](#)
- [Publishing from a project](#)
- [Updating Catalogs](#)

SMARTBIM Library Manager supports Standard and Rapid modes for [Family Content Publishing](#). You can select the mode in the Preference pane, by selecting and applying a radio button.

This section describes both modes, and suggests a workflow for beginning with Rapid mode when you need to evaluate a large collection of families and incrementally publishing families in Standard mode that you intend to keep in an office or firm-wide catalog:

- [Standard mode](#)
- [Rapid mode](#)
- [Incremental publishing, using Rapid and then Standard mode](#)



Standard mode

Standard publishing mode extracts the following assets from a family for representation in SMARTBIM Library Manager:

- Category, family name, and type names
- Type parameter names and values
- Instance parameter names and default values when available
- Type catalog data when available
- Thumbnail image of family
- DWF model of family

This information set provides you with a rich viewing and selection experience; however, Standard mode publishing can be time consuming for large collections of families.

Rapid mode

Rapid publishing mode excludes publication of the DWF model for a family. It is suitable for fast publishing of large collections of families that you can evaluate by:

- Category, family name, and type names
- Type parameter names and values
- Instance parameter names and default values when available
- Type catalog data when available
- Thumbnail image of family

Note: Rapid publishing is implemented with a Revit API method for publishing family data to an XML file. For some Revit family categories, it

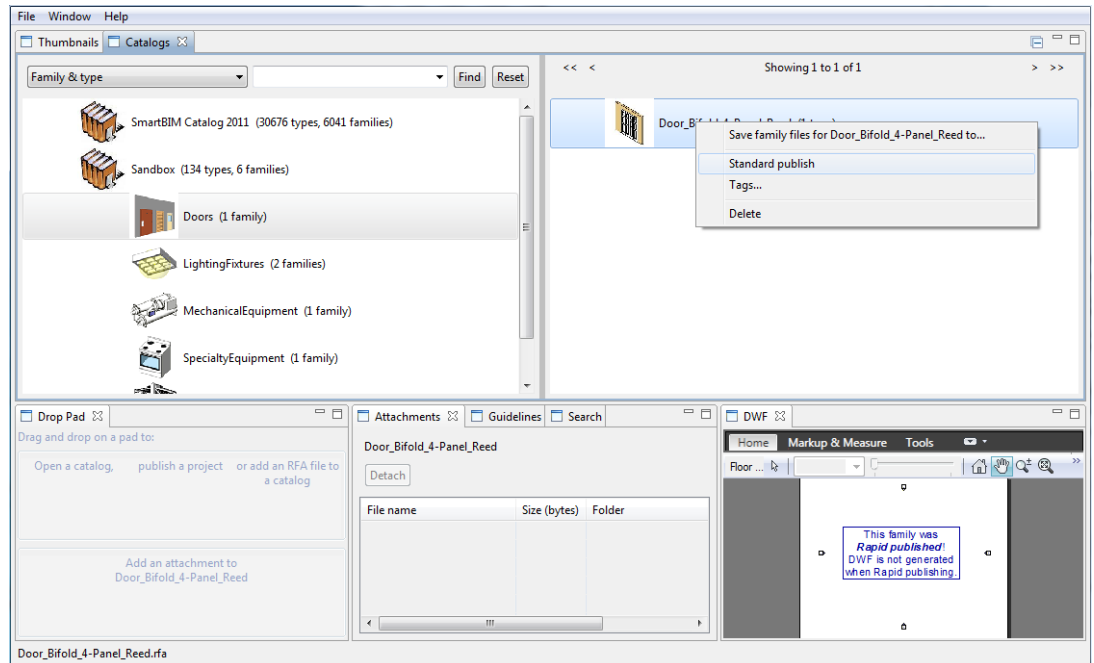
extracts a sub-set of the parameters that are extracted by [Standard mode](#).

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Incremental publishing, using Rapid and then Standard mode

When you have a large collection of families that you want to evaluate, it can be useful to publish them in Rapid mode to a temporary user-defined catalog, perform an initial review, and then Standard publish the candidate families that you want to keep and move to an office or firm-wide catalog. SMARTBIM Library Manager provides a context menu command that permits you to easily publish a family in Standard mode that was initially published in Rapid mode. To Standard publish a family that was initially published in Rapid mode:

- 1 From *Revit*, select **Publish Mode**.
- 2 From **SMARTBIM Library Manager**,
 - Select one or more families from the catalog Tree pane or a single family from the Thumbnail pane that were published in Rapid mode
 - Right-click to view the context menu and select **Standard publish**



Result: The selected families will be published in Standard mode and you will be able to view the DWF model for them.

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SMARTBIM Library Manager

Publishing from a folder

Related Help Topics

- [Family Content Publishing](#)
- [Standard and Rapid Publish modes](#)
- [Publishing from a folder](#)
- [Publishing from a project](#)
- [Updating Catalogs](#)

Publishing families from a folder

You can publish family object .rfa files that reside in a folder to a user-defined catalog in **SMARTBIM Library Manager**. You can publish either a single family or an entire folder of families, including all the families within nested folders under the source folder.

To publish family objects from a folder into **SMARTBIM Library Manager**,

- 1 Start both **SMARTBIM Library Manager** and *Revit*.
- 2 From *Revit*, select **Publish Mode** under the **SMARTBIM Library Manager Add-ins** menu.
- 3 Open Windows Explorer to view the *Revit* family or folder.
- 4 Drag the family or folder over either the *Catalogs* or the *Drop Pad* pane.
- 5 To continue,

- select an existing folder for the content or
- create a new folder by dragging the content over a blank area of the pane.

Note: Always select **Yes** when asked if you want to overwrite content when you are adding families to an existing catalog. This ensures that you have the most up-to-date family content. See [Copying and moving catalog content](#) for more information about copying over existing content.

Result: The publishing process runs and the family content loads in the selected location.

Note: For **SMARTBIM Library Manager** version 4.0 only, you can specify *Family Publishing Increment* in the *Preference* pane to chunk FCP processing in increments. This reduces system demand on memory processes. See [Incremental Family Publishing](#) for more information.

SMARTBIM Library Manager

Publishing from a project

Related Help Topics

- [Family Content Publishing](#)
- [Standard and Rapid Publish modes](#)
- [Publishing from a folder](#)
- [Publishing from a project](#)
- [Updating Catalogs](#)

Publishing from a project

You can extract the families from a *Revit* (.rvt) project by publishing them into a user-defined project catalog in **SMARTBIM Library Manager**.

To extract families from a *Revit* project and place them in a **SMARTBIM Library Manager** user-defined project catalog,

- 1 Start both **SMARTBIM Library Manager** and *Revit*.
- 2 From *Revit*, select **Publish Mode** under the **SMARTBIM Library Manager Add-ins** menu.
- 3 Open Windows Explorer to view the *Revit* .rvt project.
- 4 Drag the project .rvt file to **SMARTBIM Library Manager** over either the *Catalogs* or *Drop Pad* pane.

Result: FCP asks if you want to use an existing folder or create a new one as the destination folder.

Note: This is the location for the *Reserved For SMARTBIM* and *SMARTBIM Content* nested folders containing family data published for the catalog.

- 5 Select a folder location and click **OK**.

Result: FCP runs, saving the families to the folder and then publishes the family content.

Note: Always select **Yes** when asked if you want to overwrite content. This ensures that you have the most up-to-date family objects. See [Copying and moving catalog content](#) for more information about copying over existing content.

- 6 Select the folder where you want to place the object(s) and click **OK**.

Note: The publishing process in *Revit* can stop if multiple users are using a single *Revit* project and the network links are broken or changed. See [Important file processing information](#) (below) and [Exiting a stopped publishing process](#) for more information.

Important file processing information

- **Maintaining linked file and central project file locations** - For *Revit* projects that have linked files or a central project file, it is necessary that the links remain valid while using *Publish from project*. Otherwise, file processing stops. If you encounter a situation during *Publish from Project* where **SMARTBIM Library Manager** is not responding, select **End Publish Mode** from *Revit* and verify that all *Revit* linked files and / or central project file paths refer to valid locations within the file system.

SMARTBIM Library Manager

Exiting a stopped publishing process

Related Help Topics

- [Publishing catalogs](#)
- [Exiting a stopped publishing process](#)
- [Standard and Rapid Publish modes](#)
- [Updating Catalogs](#)

In projects where multiple users access a central *Revit* project file or work from linked models, *Publish from Project* process can stop if the link to a central *Revit* model or a linked file is broken. It is critical that all links remain intact when using *Publish from Project*.

Use the steps in this section to exit the publishing process. If you encounter a situation where *SMARTBIM Library Manager* is not responding running the *Publish from Project* process.

To exit from a stopped publish process,

- 1 While using drag-and-drop to publish a project, *Revit* displays a message stating that a central file is missing or a linked file is not found.
- 2 Click **OK**.
Result: The *Revit Journal Error* message is displayed.
- 3 Click **Enter Interactive Mode**.
- 4 In *Revit*, exit the project you are attempting to publish and click **End Publish Mode**.
Result: The publish process ends.
- 5 Verify that all links to the project you are publishing are intact before you attempt to re-publish the project.

Note: an alternative approach is to *SAVE-AS* the project to a new (temporary) file name, detach the file from Central, and remove all linked files. Then *Publish From Project* the temporary project file that has no links to external files.

SMARTBIM Library Manager

Updating catalogs

Related Help Topics

- [Creating a New Catalog](#)
- [Copying and Moving catalog content](#)
- [Converting catalogs for Revit versions](#)
- [Opening and closing catalogs](#)
- [Renaming a catalog](#)
- [Updating catalogs](#)
- [Working with references](#)
- [Searching in SMARTBIM Library Manager](#)
- [Inserting Families in Revit](#)

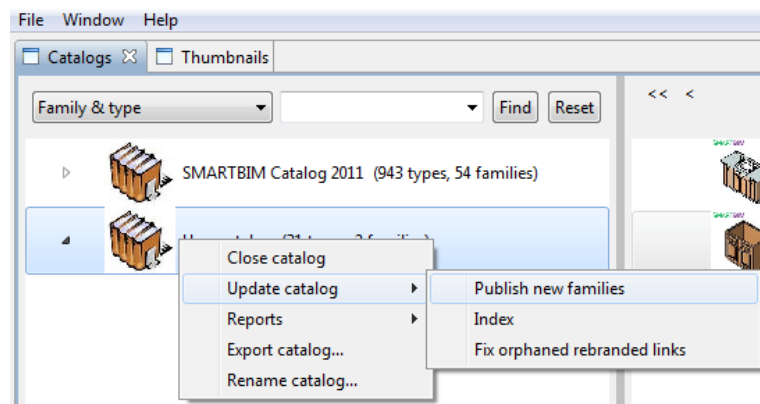
Updating catalogs

SMARTBIM Library Manager supports three catalog update operations:

- [Publish New Families](#)
- [Index](#)
- [Fix orphaned rebranded links](#) *(New in v4.1)*

Publish New Families

After you add or [edit](#) families in file folder that has been published to a user-defined catalog, you can publish the changes to the catalog in SMARTBIM Library Manager with the *Update catalog, Publish New Families* command.



Note: The [Family Content Publishing process](#) (FCP) considers a family updated when its "save date" changes.

To update the families in a catalog,

- 1 Start *Revit* and **SMARTBIM Library Manager**.
- 2 From *Revit*, select **Publish Mode**.
- 3 From **SMARTBIM Library Manager**,
 - right-click a user defined catalog in the *Catalogs* pane and
 - select **Update Catalog, Publish new families**.

Result: New and updated families are published for the catalog.

Editing a family in a user defined catalog in the Revit Family Editor

You can use drag-and-drop to open and edit a family in the *Revit Family Editor*. You can perform this task from any user-defined catalog in **SMARTBIM Library Manager**, but not from the default *SMARTBIM Catalog*.

To edit a family in the Revit Family Editor:

- 1 Open both **SMARTBIM Library Manager** and *Revit* on your desktop.
- 2 From **SMARTBIM Library Manager**, open the user-defined catalog to display the family you want to edit.
- 3 Drag and drop the family over the *Revit* workspace.

Note: You can drag a family from either the *Catalogs* pane or from the thumbnail in the *Thumbnails* pane.

Result: The family opens in the *Revit Family Editor*.

- 4 Make any changes you want to the family.
- 5 Save the family

Index

The **Index** command refreshes the index that SMARTBIM Library Manager creates for searching a user-defined catalog. You should refresh index after adding families to a user-defined catalog or [adding tags](#) to families in a user-defined catalog. To refresh the index:

- 1 Select a user-defined catalog in the [Catalog Pane](#).
- 2 Right-click to open the context menu for the catalog.
- 3 Select the **Update catalog, Index** command

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Fix orphaned rebranded links

The collection of families that are distributed in SMARTBIM Catalog include new and re-branded families from SMARTBIM Library Manager 4.0, which was developed and released by Reed Construction Data. When you use the [Content Update Service](#) to download SMARTBIM content, the families in SMARTBIM Catalog that have 'Reed Construction Data' branding will be swapped for the same content, renamed with the SMARTBIM brand.

If your user-defined catalogs contain references to the Reed content, the references will be 'orphaned' and It will be necessary to fix the reference links i.e., re-map the references to the equivalent SMARTBIM-branded families. To fix an orphaned link due to SMARTBIM re-branding:

- 1 Select a user-defined catalog in the [Catalog Pane](#).
- 2 Right-click to open the context menu for the catalog.
- 3 Select the **Update catalog, Fix orphaned rebranded links** command

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SMARTBIM Library Manager

Downloading content updates

Related Help Topics

- Welcome to SMARTBIM Library Manager Online Help
- Getting started
- Using SMARTBIM Library Manager
- Publishing catalogs
- Downloading content updates
- Contacting SMARTBIM Library Manager Customer Care

SMARTBIM Library Manager regularly provides you with content updates for download into the default *SmartBIM Catalog*. Downloading new content is optional—you choose only the content you want to download. It is recommended, however, that you select to download all content updates in order to have the most up-to-date families for your use.

The *SMARTBIM Content Update* menu displays when new content is available when you first start **SMARTBIM Library Manager**. Select the content you want, or click **Cancel** if you choose to decline the update.

- **For single-license users**

The *SMARTBIM Content Update* menu displays when you start **SMARTBIM Library Manager** and new content is available.

- **For non-administrative network license users**

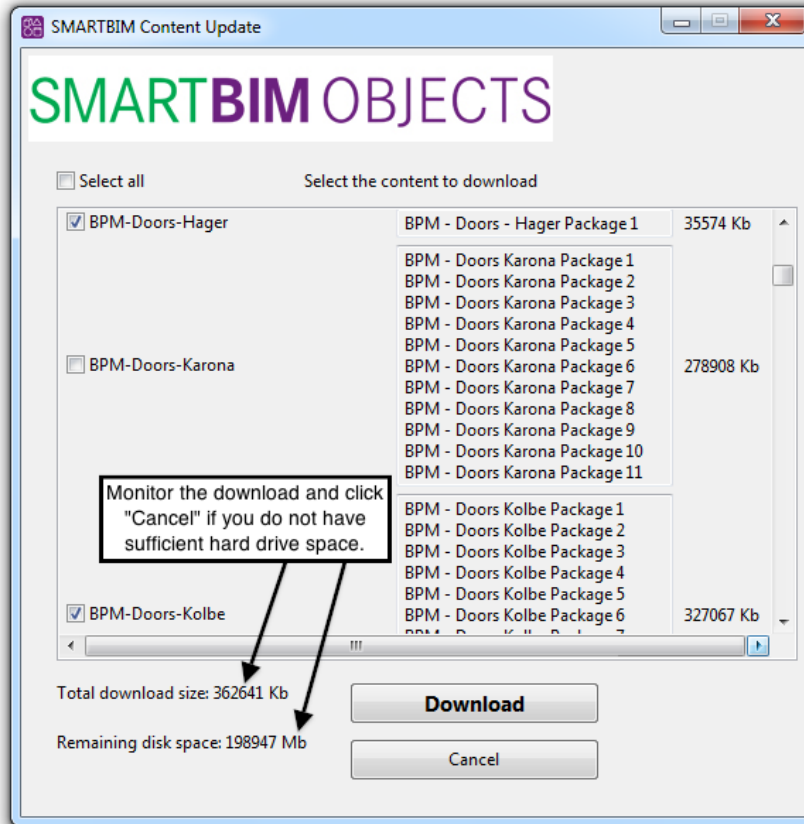
Your network administrator is responsible for content updates for your system. The *SMARTBIM Content Update* menu does not display when you start **SMARTBIM Library Manager**.

- **For network license administrators**

The *SMARTBIM Content Update* menu displays when you start **SMARTBIM Library Manager** and new content is available.

To download new **SMARTBIM Library Manager** content,

- 1 When the *SMARTBIM Content* menu is displayed,
 - select the content you want to download or
 - click **Select All** to download the entire update.
- 2 During the update, watch the download status at the bottom of the menu to verify that you have sufficient space on your hard drive for the update. Click **Cancel** if you do not have the space for the download:



Note: If you click **Cancel** the content is still available. You are prompted to download the content the next time you start **SMARTBIM Library Manager**.

- 3 You can continue using **SMARTBIM Library Manager** while the new content loads into the library. The new families appear in the

SMARTBIM *Catalog* when the download is complete.

Note: For issues regarding downloading and installing content updates, contact [Customer Care](#).

SMARTBIM Library Manager

Contacting SMARTBIM Library Manager Customer Care

Related Help Topics

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[Using SMARTBIM Library Manager](#)

[Publishing catalogs](#)

[Downloading content updates](#)

[Contacting SMARTBIM Library Manager Customer Care](#)

Help Topics Available

Our Customer Care Department is committed to providing products and services at the highest level and is always interested in hearing what you have to say. Before calling, be sure to first check the Help for tips that might resolve your issue more quickly.

Contact Customer Care if you experience any of the following:

- Technical issues, such as a feature that does not work
- Problems accessing your regional subscription lists
- Any other application-related issues

By telephone

Contact Customer Care by phone at 1.877.436.9031

Monday through Friday

8:00 AM to 5:00 PM PST

By e-mail

Send e-mail requests to SMARTBIMSupport@SMARTBIM.com.

Building Intelligence

SMARTBIM

[SMARTBIM QTO Cost Check Online Help](#) [Home](#)

SMARTBIM QTO Cost Check

SMARTBIM QTO Cost Check Online Help

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- [Known Issues](#)
- [QTO End User License Agreement](#)
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SMARTBIM QTO Cost Check

Known Issues

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[QTO End User License Agreement](#)

The following is a list of known issues affecting the current **SMARTBIM QTO Cost Check** release:

- The trial license must be activated with the required user information fields before entering a full desktop license code.
- **SMARTBIM QTO Cost Check** populates the name of files to be exported to *Excel* and PDF format with a colon character ":" for both "Entire Project" and "Active View" takeoffs. The file name is invalid due to the inclusion of this character, therefore the file must be renamed before being exported.
- For the System Family "Ramps" **SMARTBIM QTO Cost Check** applies the Type name for the Family name.
- **SMARTBIM QTO Cost Check** does not link the *Revit* Assembly Code for "Standing Seam Roofing" (B3010135) to the corresponding RSMean line items.
- In some cases the **SMARTBIM QTO Cost Check** shortcut on the *Revit* 'Add-in' Menu is greyed out on 64-bit operating systems using a network type license, and therefore **SMARTBIM QTO Cost Check** will not launch from within *Revit*. This problem is caused by an internal Windows configuration mismatch which can be addressed by a work around of switching to a desktop type license. If you experience this issue please contact [SMARTBIM Customer Care](#) for immediate assistance.

SMARTBIM QTO Cost Check

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- [Setting QTO preferences](#)
- [Customizing the QTO workspace](#)

SMARTBIM QTO Cost Check

Getting started with SMARTBIM QTO Cost Check

Related Help Topics

[Getting started with SMARTBIM QTO Cost Check](#)

[Setting QTO preferences](#)

[Customizing the QTO workspace](#)

Welcome to **SMARTBIM QTO Cost Check**, the best source for accurate cost planning for all your commercial construction needs.

About SMARTBIM QTO Cost Check

SMARTBIM QTO Cost Check is a quick and efficient method of providing accurate cost modeling for the commercial construction industry. By combining the Building Information Modeling (BIM) power of **SMARTBIM Library Manager** and the cost information database of **CostWorks**, you can launch **SMARTBIM QTO Cost Check** while using Revit Architecture to create a comprehensive quantity takeoff (QTO) line for each item in your project.

Using SMARTBIM QTO Cost Check

To use **SMARTBIM QTO Cost Check**, simply open your project in Revit Architecture and then click the link for **SMARTBIM QTO Cost Check**. Your project opens in **SMARTBIM QTO Cost Check** showing each project item represented with a separate takeoff line.

You can add customized takeoff lines, change installation and material costs for any takeoff line, export your cost data as a spreadsheet or a PDF document, and quickly update your project with the latest cost-related data. For more information, see [Using SMARTBIM QTO Cost Check](#).

How SMARTBIM QTO Cost Check works

When you open your project with **SMARTBIM QTO Cost Check**, takeoff lines are created using your project data in Revit (or from customized BIM data):

Stage	Description
1	A building has 10 instances of a wall named "interior partition", and each instance is 10' high and 8' long.
2	SMARTBIM QTO Cost Check represents the wall data in a takeoff line with the following basic information: <ul style="list-style-type: none">• Category = <i>Walls</i>• Type = <i>Interior partition</i>• Count = <i>10</i>• Quantity = <i>800 sq. ft.</i>
3	SMARTBIM QTO Cost Check uses <i>costlines</i> in the CostWorks cost data service to derive the unit cost. In this example, a <i>wall</i> unit cost of \$10/sq. ft. has the following takeoff line total: $\$10/\text{sq. ft.} * 800 \text{ sq. ft.} = \mathbf{\$8,000k}$. Note: <i>Costlines</i> represent the installed unit costs of typical building products and associated <i>assemblies</i> . An <i>assembly</i> is a collections of unit line items such as framing, insulation, and finishing materials, and <i>unit lines</i> represent the installed costs of discrete products, such as kitchen cabinets.

SMARTBIM QTO Cost Check

Setting QTO preferences

Related Help Topics

- [Getting started with SMARTBIM QTO Cost Check](#)
- [Setting QTO preferences](#)
- [Customizing the QTO workspace](#)

You can set the preferences for either the current project or for each project you open in **SMARTBIM QTO Cost Check**.

Note: Any *User* preferences override settings you make for *Project* preferences. Make sure your preference settings do not conflict with each other.

To set preferences,

- 1 From the menu bar, choose from the following to set your preferences.

If you are setting preferences for...	Then click...
all projects	Preferences > Default Preferences.
just the current project	Preferences > Project Preferences.

Result: The preferences menu displays.

- 2 The options are the same for both *Default* and *Project* preferences. Use the following table for the options for setting preferences.

Preference	Description
<i>Project Quality</i>	Select from the following: <ul style="list-style-type: none"> • Economy • Standard • Premium • Luxury
<i>Labor Type</i>	Select from the following: <ul style="list-style-type: none"> • Standard Union • Open Shop
<i>Location</i>	Select from the following: <ul style="list-style-type: none"> • National Average • United States • Canada
<i>Contractor fees</i>	Select a percentage of the project total.
<i>Architectural fees</i>	
<i>User fees</i>	

- 3 Once you make your selections, click **Save**.

Result: Your preferences are saved.

SMARTBIM QTO Cost Check

Customizing the QTO workspace

Related Help Topics

- Getting started with SMARTBIM QTO Cost Check
- Setting QTO preferences
- Customizing the QTO workspace

This section contains information about how you can customize **SMARTBIM QTO Cost Check** to make the best use of your workspace:

- [Adjusting panes](#)
- [Sorting project takeoff line data](#)
- [Moving project category columns](#)
- [Creating multiple category windows](#)

Adjusting panes

The project, guideline, and cost summary panes can be moved to any location within the **SMARTBIM QTO Cost Check** workspace and to another monitor in a networked system.

To adjust **SMARTBIM QTO Cost Check** panes,

- 1 Click on the top bar of the pane:



- 2 Drag the pane to the desired location. The panes can "click" into position according to their proximity to the edges of the window, or they can float inside the workspace window. In networked systems, simply drag the pane to the desired location on another monitor.

Sorting project takeoff line data

Your project data loads into **SMARTBIM QTO Cost Check** in columns that sort according to preferences in Revit. You can re-sort the data in **SMARTBIM QTO Cost Check** by clicking on the column heading. Clicking once sorts data in ascending order. When you click a second time, the items sort in descending order.

The data in each cell is linked to all other cells in the same row. Resorting one column usually results in multiple rows of takeoff data resorting. However, the relationship of data within each row is preserved. There is no resorting you can do that results in mismatched data.

The following table describes how data is resorted in **SMARTBIM QTO Cost Check** project view.

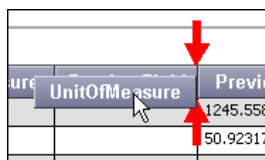
Order	Description
Ascending	<ul style="list-style-type: none"> • Alphabetic entries sort from A to Z. • Numeric entries sort from zero to the highest number in the column. • Alphanumeric entries sort first by number (lowest to highest) and then alphabetically, A to Z.
Descending	<ul style="list-style-type: none"> • Alphabetic entries sort from Z to A. • Numeric entries sort from the highest number in the column to zero. • Alphanumeric entries sort first alphabetically, Z to A, and then numerically (highest to lowest).

Moving project category columns

The category columns of the project view can be moved into any horizontal location in the **SMARTBIM QTO Cost Check** workspace, letting you reorder the columns as required.

To move the category columns of the project view,

- 1 Click on the title of the category column and drag the column until two red arrows appear:



Note: The red arrows indicated the new location for the column.

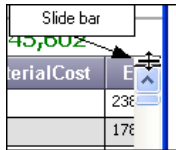
- 2 Release the mouse button to snap the column into place in the new location.

Creating multiple category windows

You can drag the top bar of the category window down to create multiple category windows. Each window has the same functionality as the original window, allowing you to work with as many category windows as you need.

To create multiple category screens,

- 1 From the category window, move the mouse cursor to the upper right side of the window until the cursor becomes a slide bar:



- 2 Holding the mouse button down, drag the window *down* and away from the top of the page, creating a second header for the category window.
- 3 Repeat [step 2](#) for as many additional category windows as you need.
- 4 To close the additional windows, drag the slide bar back up to the top until the window merges with the original window.

x

SMARTBIM QTO Cost Check

Using SMARTBIM QTO Cost Check

Related Help Topics

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- [Launching QTO](#)
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- [Using QTO file menu commands](#)
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SMARTBIM QTO Cost Check

Launching QTO

Related Help Topics

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[Updating Revit elements](#)

[Updating and editing takeoff cost data](#)

[Clearing change highlights](#)

This section describes how to launch **SMARTBIM QTO Cost Check** from Revit or the Windows Start menu.

- [Launch from Revit](#)
- [Launch from the Windows Start menu](#)

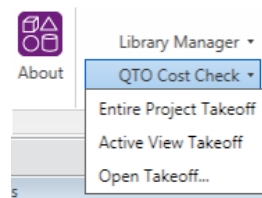
You must launch **SMARTBIM QTO Cost Check** from Revit to initiate a new project takeoff or update the Revit elements in an existing one.

You can optionally launch **SMARTBIM QTO Cost Check** from the Windows Start Menu as a standalone application (without Revit) to open and edit an existing takeoff. This feature permits estimators who do not use Revit to work with the application once a Revit modeler has saved an initial takeoff file from **SMARTBIM QTO Cost Check**.

Launch from Revit

There are three Revit Add-in commands for launching **SMARTBIM QTO Cost Check**

- [Entire Project Takeoff](#)
- [Active View Takeoff](#) *(New in v2.1 for Revit 2011)*
- [Open Takeoff...](#)



Note: The Revit Add-in menu is greyed out and therefore not accessible when the Revit project is in a perspective based camera view. An isometric based view must be selected for performing a takeoff or launching QTO.

Entire Project Takeoff

When you select *Entire Project Takeoff*, **SMARTBIM QTO Cost Check** will extract every element placed in the Revit project to the takeoff.

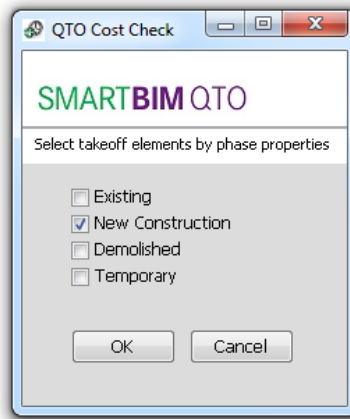
Active View Takeoff

When you select *Active View Takeoff*, **SMARTBIM QTO Cost Check** will extract the visible elements in the Revit Active View.

This functionality permits you to use the powerful view and phase filtering capabilities of Revit to control the building elements that you extract to a quantity takeoff and cost check in **SMARTBIM QTO Cost Check**. To extract the Revit Active View:

- 1 In Revit, create or select and configure the view you want for the takeoff. This means you should determine the kind of view (plan, 3D, etc.), and setup the visibility of building elements in the view, using the *Visibility/Graphic Overrides* and *Phase Filter* tools in Revit. Please refer to the Autodesk Revit Help system for information about setting up Revit Views, *Visibility/Graphic Overrides*, *Phases*, and *Phase Filters*.
- 2 In Revit, select *SMARTBIM QTO Cost Check, Active View Takeoff* from the SMARTBIM add-in menu,
- 3 SMARTBIM QTO Cost Check will collect the visible elements in the Revit *Active View* and permit you to filter them by [User-defined phases and element phase states](#), which SMARTBIM QTO Cost Check calculates from the *View Phase*, and the *Phase Ceated* and *Phase Demolished* properties of each element.

You can select one or more [User-defined phases and element phase states](#) from the dialogue box:



Result: The Active View, filtered by user-defined phases and element phase states will be extracted to a takeoff in SMARTBIM QTO Cost Check.

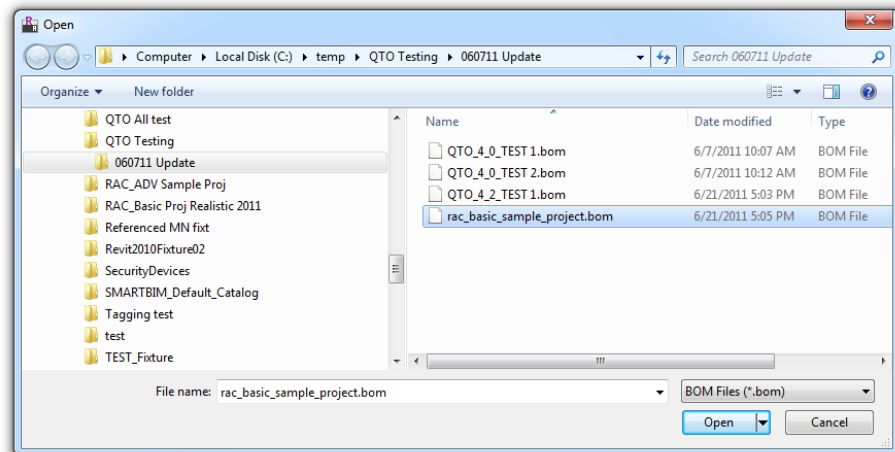
Note: When a Revit Visible View Region cuts through a building element, the quantity for the element in the Revit Active View includes the entire element, not the cut quantity.

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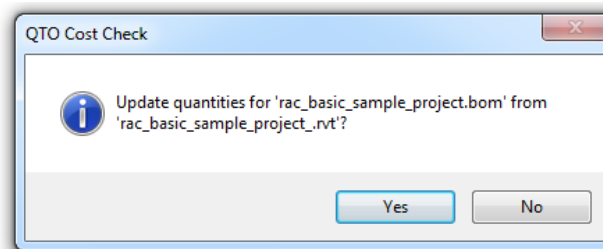
Open Takeoff

When you select *Open Takeoff*, **SMARTBIM QTO Cost Check** will present a Windows File Open dialogue box for you to select and open a takeoff file (.BOM) that you saved from a previous session of using **SMARTBIM QTO Cost Check**. To open an existing takeoff:

- 1 Open your *Revit* project.
- 2 Select *SMARTBIM QTO Cost Check, Open Takeoff* from the SMARTBIM Revit Add-in menu
- 3 Select a takeoff file (.BOM) from the *File Open* dialog box.



- 4 SMARTBIM QTO Cost Check will open the takeoff file and present a message that asks if you want to update quantities from the current Revit project



Note: if you click *Yes*, **SMARTBIM QTO Cost Check** will update quantities for Family and Type names in the Revit project that match Family and Type names in QTO takeoff lines. It will add takeoff lines for new Family and Type names from the Revit project and remove takeoff lines that have no Family and Type match in the Revit project.

Result: The takeoff file is opened in **SMARTBIM QTO Cost Check**

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Launch from Windows Start Menu

To launch **SMARTBIM QTO Cost Check** from the Windows Start menu:

- 1 Select All Programs from the Windows Start Menu,
- 2 Navigate and left-click the SMARTBIM folder
- 3 If you are using Revit 2010, left-click the 2010 folder;
If you are using Revit 2011, left-click the 2011 folder.
- 4 Left-click on the SMARTBIM QTO Cost Check 2.1 launch icon

Result: SMARTBIM QTO Cost Check will launch. Use the *File, Open Project* command open a takeoff file.

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SMARTBIM QTO Cost Check

User-defined phases and element phase states

Related Help Topics

- [Launching QTO](#)
- [Working with QTO panes](#)
- [Getting QTO cost estimates](#)
- [Working with user-defined takeoff lines](#)
- [Using QTO file menu commands](#)
- [Updating Revit elements](#)
- [Updating and editing takeoff cost data](#)
- [Clearing change highlights](#)

This section defines **SMARTBIM QTO Cost Check** element phase states with respect to building elements in Revit.

Every Revit element has a *Phase Created* and a *Phase Demolished* property. The default values include:

Phase Created	Phase Demolished
Existing	Existing
New Construction	New construction
User defined phase	User-defined phase
	None

Based on these values, **SMARTBIM QTO Cost Check** calculates the following 'phase states', which correspond to the check boxes for filtering the *Active Revit View* for a quantity takeoff:

Element phase state name	Building Element Phase Created Value	Building Element Phase Demolished Value
Existing	Existing	None
User-defined phase	User-defined phase	None
New Construction	New Construction	None
Demolished	Existing	Existing
Demolished	Existing	User defined
Demolished	Existing	New Construction
Temporary	User defined	New Construction
Temporary	New Construction	New Construction
Temporary	User defined	User defined

Note:

- An alternative way to define Demolished is: Phase Created equals Existing and Phase Demolished has a value.
- An alternative way to define Temporary is: Phase Created does not equal Existing and Phase Demolished has a value

SMARTBIM QTO Cost Check

Working with QTO panes

Related Help Topics

- Launching QTO
- Working with QTO panes
- Getting QTO cost estimates
- Working with user-defined takeoff lines
- Using QTO file menu commands
- Updating Revit elements
- Updating and editing takeoff cost data
- Clearing change highlights

The **QTO** workspace is comprised of separate panes, each pane containing a different section that you use in getting cost estimates. This section contains a description of the different panes that make up the **QTO** workspace:

- [Viewing panes](#)
- [Using the Element Tree pane](#)
- [Using the Category Guidelines pane](#)
- [Using the Cost Summary Report pane](#)

Viewing panes

The *View* menu is used to access and view panes in the **QTO** workspace.

To view panes,

- 1 From the menu bar, click **View** and then select the pane to view:
 - **Element Tree**
 - **Guidelines**
 - **Cost Summary**

Result: The selected pane appears in the display window.
- 2 You can drag **QTO** panes to any location on your desktop, including to a second monitor in networked systems. See [Customizing the QTO workspace](#) for information about adjusting **SMARTBIM QTO Cost Check** to suit your needs.

Using the Element Tree pane

The **SMARTBIM QTO Cost Check** *Element Tree* pane contains a visual representation of all the elements present in your project. You can use the *Element Tree* pane to see totals of both *individual* and *project* element takeoff lines and related cost summaries.

When you double-click on an icon in the *Element Tree* pane,

- the takeoff summary grid refreshes showing a total of all the takeoff lines for the selected element and
- the *Cost Summary Report* pane refreshes with a total cost for the selected element.

Note: You can get *project total* results by clicking on the *Project Name* icon located at the top of the element list (the same name as the project).

To use the *Element Tree* pane,

- 1 Choose from the following.

If you want to see...	Then double-click on the...
information on a specific element	specific <i>element</i> icon.
project total information	<i>project</i> icon at the top of the <i>Element Tree</i> .

Result: The takeoff data for the selected item display in the project grid, and the *Cost Summary Report* pane displays the cost total information for your selection.

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Using the Category Guidelines pane

The **SMARTBIM QTO Cost Check** *Category Guidelines* pane lets you see a full description of each category (such as *doors* or *windows*) for each takeoff line in your project. The *Category Guidelines* pane displays an image of the element followed by a description of the element characteristics, including family name, naming convention, price, and conceptual costs.

Note: You can also click **Index** from the top of the *Category Guidelines* pane to select from a list of element icons.

The following table describes the fields in the *Category Guidelines* pane.

Field	Description	
Overview	<i>Category</i>	The type of element, such as <i>Doors</i> or <i>Windows</i> .
	<i>Kind of Family</i>	The general use-description of the element, either <i>System</i> or <i>Component</i> .
	<i>Description</i>	The description of the element, including construction uses for

		the element, practical definitions and constraints, and ways to manipulate the element in projects.
<i>Suggested Name Convention</i>	<i>Pattern</i>	The naming convention for elements. Use this convention when creating your own user-defined elements.
<i>Family Name Node (Revit Defined)</i>	<i>System Family</i>	How Revit names family nodes. See the online Help menu for Revit for more information about how family node names are used.
<i>Family Name Nodes and Typical Values</i>	<i>Kind-of-Element/Shape/Feature</i>	The types of the element available in the project.
	<i>Application</i>	Optional value describing how the element is used.
	<i>Panel Operation</i>	Optional value describing the dynamic properties of the element.
	<i>Dimension</i>	The dimensions of the element available in the project.
	<i>Origin</i>	The manufacturer of the electronic element.
	<i>Identity and/or Model</i>	Optional value for the name and model name number for the element.
<i>Type Name Nodes and Typical Values</i>	<i>Dimension/Shape</i>	If applicable, the dimensions of the element.
	<i>Construction</i>	Optional value for the composition of the element.
	<i>Finish and/or Options</i>	Optional value for the finish and other options for the element.
<i>Worked Examples</i>	<i>Family</i>	The family name for the element in the example.
	<i>Type</i>	The type of the element used in the example.
	<i>Complete Name</i>	The full name of the element used in the example.
<i>Reporting</i>	<i>Revit Schedules</i>	A tabular display of information extracted from the properties of elements in a project. A schedule can list every instance of the type of element you are scheduling, or it can collapse multiple instances onto a single row, based on the schedule's grouping criteria.
	<i>Quantity Take-Off</i>	A brief explanation of using SMARTBIM QTO Cost Check to determine project costs.
	<i>SMARTBIM QTO Cost Check Conceptual Costs</i>	A low, medium, and high average estimated cost for the element.

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Using the Summary Cost Report pane

The **SMARTBIM QTO Cost Check** *Cost Summary Report* pane displays a total of all cost information shown in the takeoff line grid. This can be either a summary of the entire project or the total cost for the takeoff lines of selected elements. See [Using the Element Tree pane](#) for information about costing summaries for both individual project elements and for project totals.

Note: You can select **Estimate Cost** from the **SMARTBIM QTO Cost Check** menu to have the entire project refresh with the latest cost data in the *Cost Summary Report* pane.

The following table contains a description of the fields in the *Cost Summary* pane.

Value	Description
<i>Total Material Cost</i>	The total cost of all materials in the project. This value can be edited for each takeoff line item. See Updating and editing takeoff cost data for more information.
<i>Total Installation Cost</i>	The total cost for all installations in the project. This value can be edited for each takeoff line item. See Updating and editing takeoff cost data for more information.
<i>Total Cost</i>	The total of <i>Material</i> and <i>Installation</i> values.
<i>Contractor Fees (xx%)</i>	The fees paid to project contractors based on percentage. See Setting QTO preferences for information about setting this value.
<i>Construction Cost</i>	The total of costs including contractor fees.
<i>Architectural & Engineering Fees (x%)</i>	The fees paid for architectural, engineering, and other services based on percentage. See Setting QTO preferences for information about setting this value.
<i>Other Fees (x%)</i>	
<i>Total Building Cost</i>	The total of all fees.

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SMARTBIM QTO Cost Check

Getting QTO cost estimates

Related Help Topics

- [Launching QTO](#)
- [Working with QTO panes](#)
- [Getting QTO cost estimates](#)
- [Working with user-defined takeoff lines](#)
- [Using QTO file menu commands](#)
- [Updating Revit elements](#)
- [Updating and editing takeoff cost data](#)
- [Clearing change highlights](#)

This section describes how you can get cost estimates for your *Revit* projects using **SMARTBIM QTO Cost Check**.

To get the cost estimate totals for your *Revit* project,

- 1 Open your *Revit* project in **SMARTBIM QTO Cost Check**.
- 2 At the top of the menu, select the **Building Type** from the drop-down list and enter a square footage in the *Area* box.
- 3 Click **Estimate Cost**.

Result: The menu refreshes and the *Cost Summary* window shows the cost totals for your project, as shown in the example below:

Cost Summary	
Total Material Cost	\$ 14,000
Total Installation Cost	\$ 21,000
Total Cost	\$ 35,000
Contractor Fees (25%)	\$ 8,750
Construction Cost	\$ 43,750
Architectural & Engineering Fees (7%)	\$ 2,450
Other Fees (0%)	\$ 0
Total Building Cost	\$ 46,200

SMARTBIM QTO Cost Check

Working with user-defined takeoff lines

Related Help Topics

- [Launching QTO](#)
- [Working with QTO panes](#)
- [Getting QTO cost estimates](#)
- [Working with user-defined takeoff lines](#)
- [Using QTO file menu commands](#)
- [Updating Revit elements](#)
- [Updating and editing takeoff cost data](#)
- [Clearing change highlights](#)

Each takeoff line represents a collection of Revit (or BIM) elements that are to be counted and quantified as a unit. You can create a user-defined takeoff line to manually add data to your project in **SMARTBIM QTO Cost Check**, defining each characteristic of the line to your specifications. User-defined takeoff lines display with the other takeoff lines in your project view and can be edited and removed from your project when necessary. User-defined takeoff lines are not affected when you globally update your project data.

Tip: See [Working with QTO panes](#) for more information about the different fields and naming conventions used for **SMARTBIM QTO Cost Check** takeoff line elements.

This section contains the following topics:

- [Adding a user-defined takeoff line](#)
- [Editing and removing a takeoff line](#)

Adding a user-defined takeoff line

To add a user-defined takeoff line,

- 1 With your project open in **SMARTBIM QTO Cost Check**, click either
 - **File** and then click **New TakeOff Line** or
 - on an existing takeoff line item, **right-click** and then click **Add new**.

Result: The *Edit Takeoff Line* menu is displayed at the bottom of the window.

- 2 Use the following table to complete the values in the *Edit Takeoff Line* menu.

Field	Description	
<i>Takeoff Line</i>	<i>Category</i>	The type of element, such as <i>Walls</i> or <i>Floors</i> .
	<i>Family</i>	A description of the <i>Category</i> element. Example: <i>Tile_Vinyl-Composite_Tectonic</i>
	<i>Type</i>	The individual type of element. The <i>Type</i> can be <ul style="list-style-type: none"> • the same definition as <i>Family</i> • the element measurement (length, width, or height) • a value such as <i>standard</i>, or • project location such as <i>corner</i> or <i>top</i>.
	<i>Assembly Code</i>	The Unifomat Assembly Code, if known.
	<i>Unit of Measure</i>	How the element is measured.
	<i>Count</i>	The number of items in one element.
	<i>Quantity</i>	The number of elements required in the project.
	<i>Manufacturer</i>	The company manufacturing the element.
	<i>Model</i>	The element model, or serial, number.

- 3 Click the **My Cost** tab and fill in the values for *Material Cost* and *Installation Cost*.

- 4 Click **Update**.

Result: The values and total are added to the *Cost* menu.

Note: Only the *Material Cost* and *Installation Cost* values can be edited.

- 5 Once you have completed entering the information for your item, click **Save**.

Result: The takeoff line is added to the *Category* list and an icon representing the new item is added to the *Element* pane tree.

Tip: See [Updating and editing takeoff cost data](#) for information about changing the cost of both Revit-defined and user-defined takeoff lines.

Editing and removing a takeoff line

You can edit each element of a user-defined takeoff line and also remove the line from your project list. However, you cannot delete takeoff lines automatically created in Revit.

To edit or remove a user-defined takeoff line,

1 Select the takeoff line you want to edit or remove and **right-click** to select one of the following:

- **Edit**
- **Delete**

2 Choose from the following to continue.

If you selected to...	Then the...
edit the user-defined line	<i>User Defined Costline</i> menu displays. Return to step 2 and edit the takeoff line.
remove the user-defined line	you are asked to confirm your selection. To continue, click <ul style="list-style-type: none">• OK to delete the takeoff line• Cancel to close the menu.

SMARTBIM QTO Cost Check

Using QTO file menu commands

Related Help Topics

- Launching QTO
- Working with QTO panes
- Getting QTO cost estimates
- Working with user-defined takeoff lines
- Using QTO file menu commands
- Updating Revit elements
- Updating and editing takeoff cost data
- Clearing change highlights

The **SMARTBIM QTO Cost Check** file menu commands let you open, save, and export project data, as well as update the takeoff line elements in your project.

This section contains the following sections:

- [Opening and saving projects](#)
- [Exporting project data](#)
- [Updating takeoff line data](#)

Opening and saving projects

To open and save projects,

- 1 From the menu bar, click **File** to access the menu options.
- 2 Choose from the following.

If you want to...	Then...
open a project	select the project you want to open and click Open .
save a project	select the location where you want to save the project and click Save .

Exporting project data

You can export your project takeoff data from **SMARTBIM QTO Cost Check** to an Excel spreadsheet or a PDF document.

Note: This feature requires that you have either or both Microsoft® Excel® and Adobe® Reader® installed on your computer.

To export **SMARTBIM QTO Cost Check** project data,

- 1 From the menu bar, click **File** to access the menu options.
- 2 Click **Export Data** and then click either
 - **Excel Export** or
 - **PDF Export**.

Result: A **Save As** menu opens with the project's name displayed in the *File Name* box.

- 3 Choose from the following to continue.

If you want to...	Then...	Result
use the default file name	<ul style="list-style-type: none"> • accept the default location or select another directory for the file <p>Note: The default file name includes the "Project Name", "Project Number", and "View" extracted from the Revit Project. Active View Takeoffs also include the selected "Phases".</p> <ul style="list-style-type: none"> • click Save. 	The file is saved in the selected format and location.
use a different file name	<ul style="list-style-type: none"> • accept the default location or select another directory for the file • type the new name for the file <p>Note: You cannot use the following restricted characters in the file name:</p> <p>\\ : * ? " < > [] & \$, .</p> <ul style="list-style-type: none"> • click Save. 	

Updating your takeoff data

The *Refresh QTO* feature lets you update the Revit elements in your project.

To update your takeoff data, click **File** and then click **Refresh QTO** from the menu bar.

Result: A progress bar is displayed as your Revit elements are updated.

SMARTBIM QTO Cost Check

Updating Revit elements

Related Help Topics

[Launching QTO](#)[Working with QTO panes](#)[Getting QTO cost estimates](#)[Working with user-defined takeoff lines](#)[Using QTO file menu commands](#)[Updating Revit elements](#)[Updating and editing takeoff cost data](#)[Clearing change highlights](#)

You can update your *Revit* objects while working in **SMARTBIM QTO Cost Check** without having to close and restart the application. This allows you to work with a project in *Revit* and quickly update the quantity takeoff for the same project in **SMARTBIM QTO Cost Check**.

To update *Revit* elements, click **Refresh QTO** from the menu bar. The update process runs and your *Revit* elements in **SMARTBIM QTO Cost Check** are updated.

Note: Manually edited cost data is not overwritten when you update *Revit* elements.

SMARTBIM QTO Cost Check

Updating and editing takeoff cost data

Related Help Topics

- [Launching QTO](#)
- [Working with QTO panes](#)
- [Getting QTO cost estimates](#)
- [Working with user-defined takeoff lines](#)
- [Using QTO file menu commands](#)
- [Updating Revit elements](#)
- [Updating and editing takeoff cost data](#)
- [Clearing change highlights](#)

SMARTBIM QTO Cost Check gives you access to the latest material and installation cost data for each item in your project. To ensure your project has the latest cost data, you can choose to globally update all cost data in your project or manually update individual takeoff line cost data. Cost data that you have customized is not overwritten during the update process.

This section contains the following topics

- [Globally updating cost data](#)
- [Manually editing cost data](#)

Globally updating cost data

When you choose to globally update **SMARTBIM QTO Cost Check** cost data, the latest material and installation cost information for each item in your project is collected from *RS Means* and updated into your project. Any cost data you have customized is not overwritten during this process, either for existing items imported from *Revit* or for items you have added manually.

To update cost data, open your project in **SMARTBIM QTO Cost Check** and click **Estimate Cost**. The window refreshes and the cost data updates.

Note: Manually edited cost data is not overwritten during this procedure.

Manually editing cost data

You can manually edit the material or installation cost data for any item in your project, whether the item is imported from *Revit* or is a takeoff line you create as a customization.

When you manually edit cost data, you open the specific item and update the cost directly. You can enter your own cost, or choose from a selection of predefined costs of similar items.

Note: Manually edited cost data is not overwritten when you perform a global cost data update.

To manually edit cost data,

- 1 With your project open in **SMARTBIM QTO Cost Check**, double-click on the line for the item you are changing.

Result: The *Edit Takeoff Line* menu displays.

- 2 Click the tab for *My New Cost* and enter a new cost for one or both *Material* and *Installation* costs, or choose from a list of pre-defined cost data for the same type of item.

If you want to...	Then...
manually enter the cost	<ul style="list-style-type: none"> • type the new costs for either or both <i>Material</i> and <i>Installation</i> • click Update. <p>Note: The new cost for the item is updated in the takeoff line.</p>
select from a list of same-type items	<ul style="list-style-type: none"> • click the RSMeans Cost tab • select an item from the list • click Update. <p>Note: You can see a real-time cost update in the <i>Updated</i> line.</p>

Result: The takeoff line for the item refreshes with your changes.

SMARTBIM QTO Cost Check

Clearing change highlights

Related Help Topics

- [Launching QTO](#)
- [Working with QTO panes](#)
- [Getting QTO cost estimates](#)
- [Working with user-defined takeoff lines](#)
- [Using QTO file menu commands](#)
- [Updating Revit elements](#)
- [Updating and editing takeoff cost data](#)
- [Clearing change highlights](#)

When you update your project data from *Revit*, changes made to the takeoff lines in **SMARTBIM QTO Cost Check** are highlighted, helping you to locate changed data. When you are ready for the next set of changes, you can clear the highlighting before your next project update.

To clear the change highlighting, click **Highlight Off** from the top of the menu bar. The highlights on the changed takeoff lines are cleared.

SMARTBIM QTO Cost Check

Contacting SMARTBIM QTO Cost Check Customer Care

Related Help Topics

[Contacting Customer Care](#)

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Contact Customer Care if you experience any of the following:

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- Problems accessing your regional subscription lists
- Any other application-related issues

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By telephone	By e-mail
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SMARTBIM

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