

# Release Notes

Upchain v21.1

The Upchain team is very excited to bring you v21.1!

You may have noticed we changed the numbering of our releases to align with the year, with 21.1 being the first release of 2021.

We've packed a ton of new features with this release. We've added SolidWorks configuration capabilities, a plugin for AutoCAD, new file renaming rules, an improved PDF Viewer, user teams, and more!

We'll give you the highlights here.

## **A note on the Upchain release process**

We deploy a new major release of our software every two or three months. In between major releases, we deploy weekly service updates to address any critical issues identified by our customers. We have included a summary of enhancements and fixes that were deployed in recent updates throughout these release notes.

# What's New

## SolidWorks Configurations

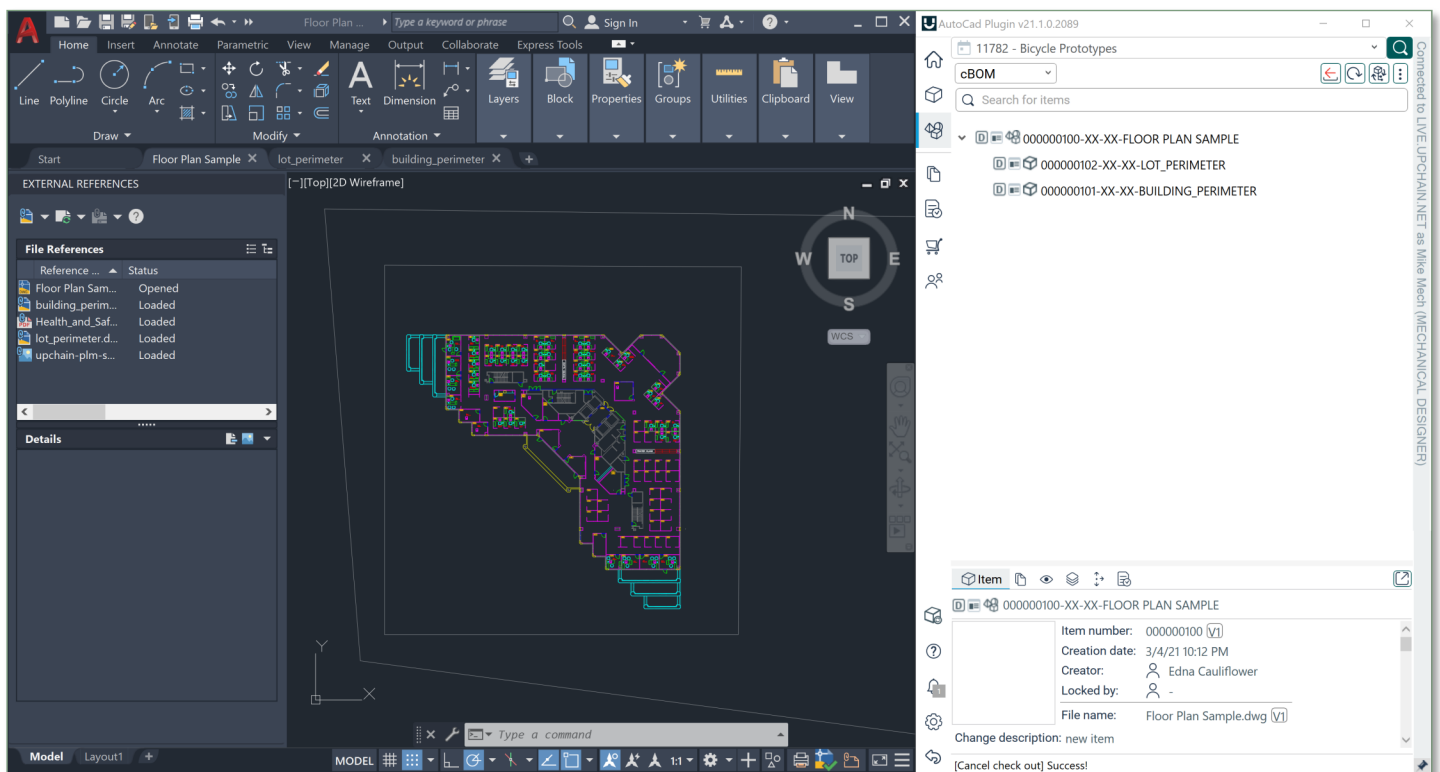
Upchain now handles SolidWorks configurations. This functionality can be enabled by Upchain through a tenant property named **enable.configurations.solidworks**. It allows you to save multiple SolidWorks configurations for a single CAD file into Upchain, each with their own eBOM structure and BOM location. During item creation, you can decide what configurations are registered to items and what the BOM location is for each one. When checking out an item with configurations, all linked configuration items are locked for editing. Enabling SolidWorks configurations affects many areas of Upchain, including: item creation, checking out/in, drawing registration, copying/cloning, searching, and the Change Request process.

The screenshot displays the Upchain CAD Check In interface, showing two eBOM structures side-by-side. The left eBOM is for 'BICYCLE-21.1.SLDASM' and the right is for 'BICYCLE-21.1.SLDASM'. Both show a hierarchical list of items with columns for Item, Version, BOM Location, Configuration Name, File Status, and Change Description. The right eBOM also includes columns for CBOM Qty, EBOM Qty, and Thumbnail. A 'Where used' panel on the right shows a tree view of the BOM structure, including '11782 - Bicycle Prototypes', 'Project BOM', 'Working eBoM', and various bicycle components like '000000001-XX-XX-MOUNTAIN BIKES', '000000065-XX-XX-MAIN TYRES', '000000076-XX-XX-FRAME', '000000077-XX-XX-ALTERNATE TYRES', '000000066-XX-XX-3. tyre-21.1', '000000067-XX-XX-bicycle frame 1-21.1', '000000068-XX-XX-bike-seat-21.1', '000000070-XX-XX-inner chain-21.1', '000000071-XX-XX-pedal-pin-21.1', '000000072-XX-XX-sprocket-21.1', '000000073-XX-XX-steering-21.1', '000000002-XX-XX-ROAD BIKES', and '000000003-XX-XX-TESTING PARTS'. The bottom of the interface shows 'Resolved Anomalies: 0 / 0' and buttons for 'Show Details', 'Previous', 'Next', 'OK', and 'Cancel'.

# What's New

## AutoCAD Plugin

We have developed a CAD plugin for AutoCAD 2020 and 2021. This means that a DWG file can be your primary cBOM file within an item. An AutoCAD cBOM is built from the DWG external references within the DWG file. Any additional external reference file types are still saved into the parent DWG file and uploaded into Upchain, but are not part of the AutoCAD cBOM and therefore do not get their own item. This new plugin is accessible from the CAD connector.



# What's New

## CAD and Drawing File Renaming During Registration

We have introduced a new tenant property named **filename.pattern** that allows you to specify how your CAD and drawing files will be renamed during the item creation process. This allows you to have more control over your file naming convention within Upchain, ensuring all file names follow a consistent format for easier identification and searching. It also means the burden of ensuring all file names are unique is removed from the designers.

Options for what to configure for the renamed files include: the item number, item name, a system generated sequence of numbers, the original file name, and fixed text, and you can configure any combination of these to suit your needs. This replaces the previous tenant property **change.file.names.to.numbers**. Upon this release, all prior filename settings will be carried over automatically; you will not need to change any tenant properties to get started. To learn more about how to configure filenames, view the Help Center article for Tenant Properties.

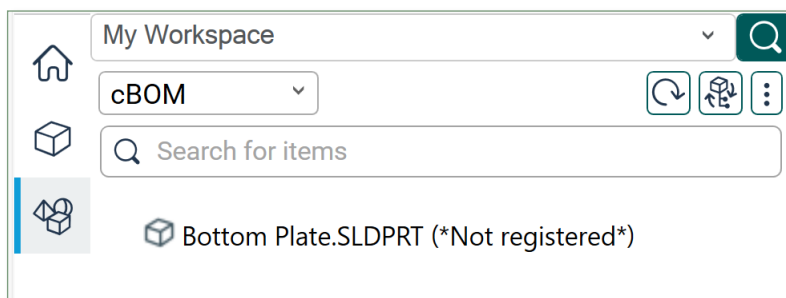
### filename.pattern

When configured, this property will enable the automatic renaming of CAD files to a standard naming rule upon the creation of an item.

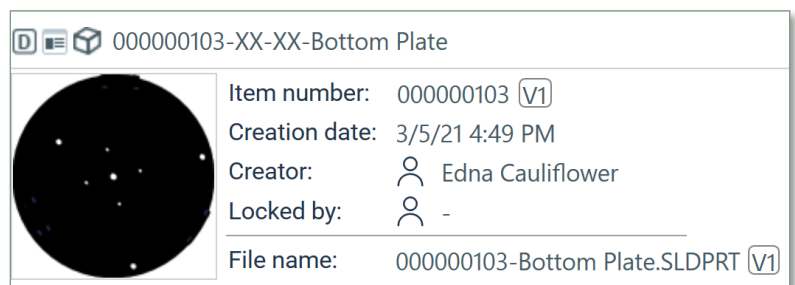
For more information on defining your CAD file naming rule, please see [Help Center: Tenant Properties](#). `${itemNumber}-${originalFilename}.${extension}`

[View the help center article.](#)

SolidWorks, NX, Inventor and Generic Plugin



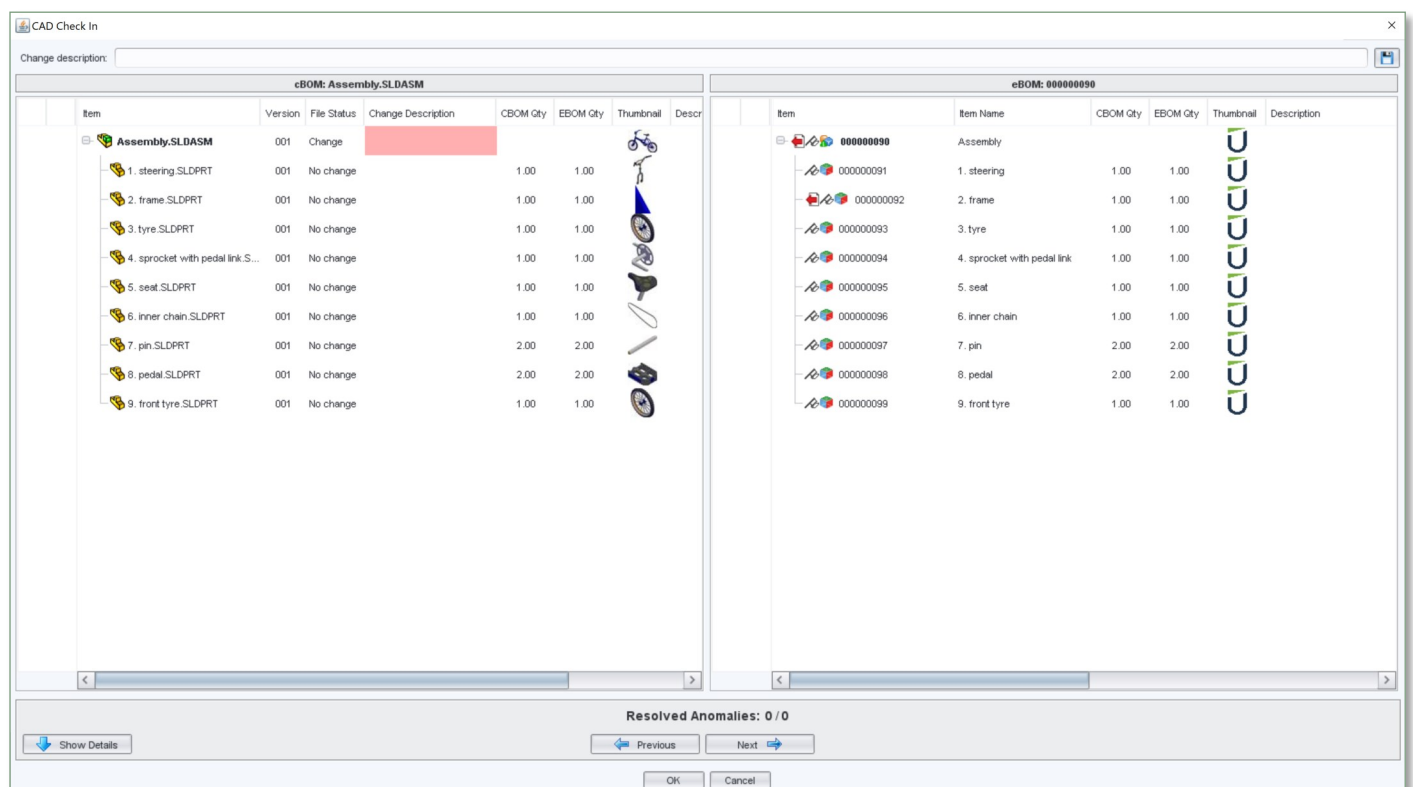
Note that SolidWorks toolbox parts (enabled through the tenant property **import.library.parts**) are not renamed. Their original filename is always retained.



# What's New

## Change Description Upon Check In

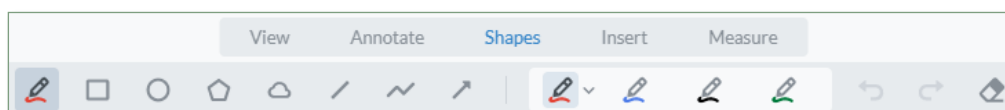
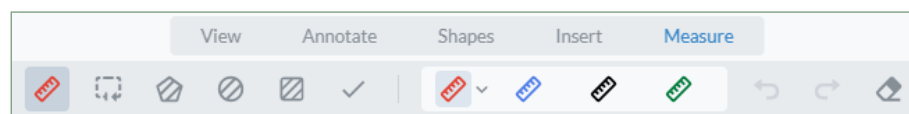
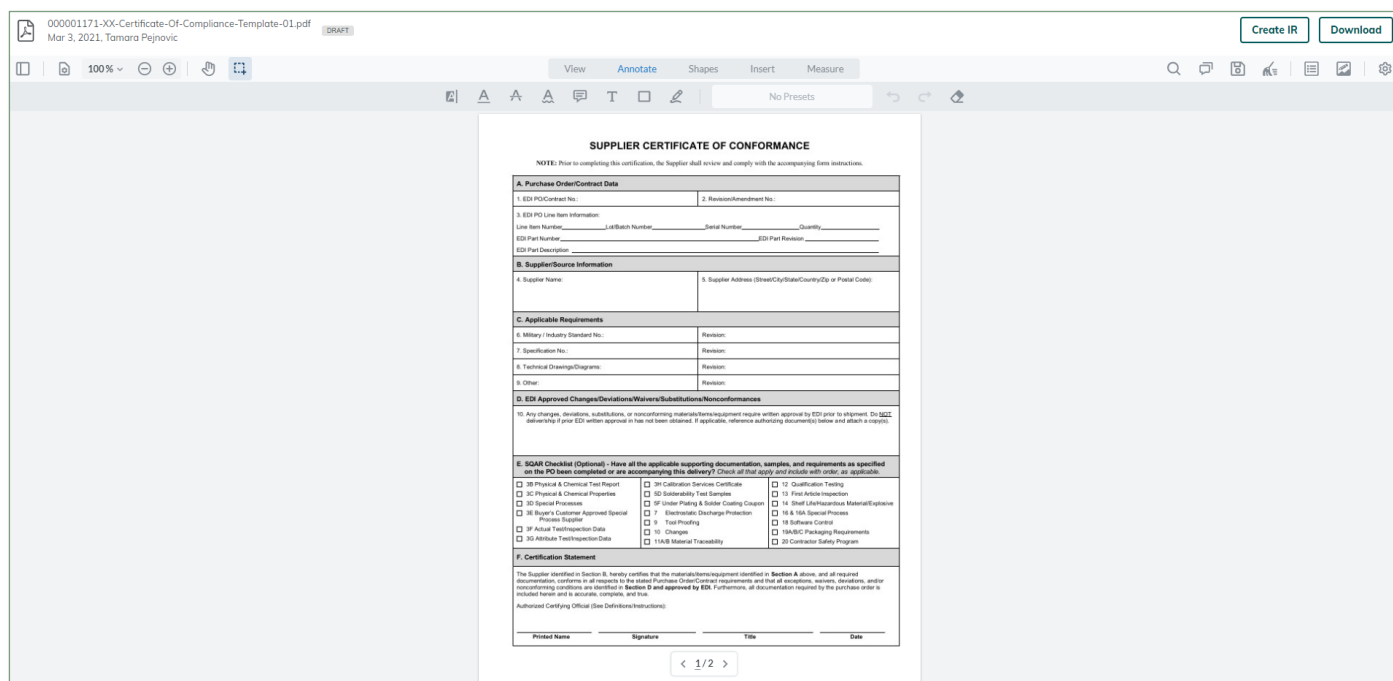
We have introduced a new tenant property named **file.version.change.description.mandatory** that, when enabled, forces the BOM Anomaly window to open during every check in to allow you to enter a change description for every file that was changed. The BOM Anomaly window indicates which files have changed to allow you to ensure all changes are being committed to Upchain. A change description must be entered for every changed file being checked in before check in can proceed. This property is disabled by default.



# What's New

## New PDF Viewer Functionality

We have upgraded the PDF Viewer in the Web application to be able to view many additional file formats, including legacy Office files (.DOC, .XLS, .PPT), images (.JPEG, .PNG, .GIF), CAD drawings (including .DWG), and more. The PDF Viewer also includes many new tools to annotate the document, including the ability to measure distances, perimeters, angles, and areas on the drawing, specifying your desired scale and precision; the ability to show and hide layers in a PDF file; create custom stamps; and much more.



# What's New

## Teams in Upchain

You can now create user teams in Upchain. A team is a group of users that do not necessarily have the same role in Upchain. You can add teams to projects, which subsequently adds all users in that team to the project making it quicker to ensure all necessary people are added to your project. Teams can be the Assignee within certain workflow primitives for any workflow type, and the tasks generated from a workflow are assigned to that team. You can also assign a team to project activities, requirements, QA processes, and tasks. One user from that team can then 'claim' the task to complete it. This allows flexibility in assigning your business processes as you are no longer limited to one person.

The screenshot displays the Upchain interface with the 'Teams' tab selected. The 'Teams' tab shows a list of teams: Team Blue, Team Yellow, Team Black, Team Green, and Team White. A 'Create team' button is visible in the top right corner of the Teams tab. Overlaid on the Teams list is a 'New stage gate' modal. The modal has a 'Details' section with the following fields:

- Type:** Stage gate
- Priority:** Medium (dropdown)
- \* Name:** Design Phase
- Assignee(s):** A dropdown menu showing a list of teams and users. The list includes: Teams, Team Blue, Users, Edna Cauliflower, Jim Sparky, Mary Proj-Man, and Mike Mech.
- Actual start:** (empty field)
- Description:** (empty text area)

At the bottom of the modal, there are two buttons: 'Cancel' and 'Add stage gate'.

# What's New

## Filtering in Administration Tables

We have introduced the ability to sort and filter columns in many of the tables in the Administration pages. The filtering options depend on the data type in each column, and you can filter multiple columns at the same time to locate relevant data. Furthermore, most tables have a quick search bar that indicates which columns it will search through and dynamically updates the table as you type.

All attributes (5)		Common attributes (4)		Custom attributes (1)		Filter options		Search by name or description		Add new attribute	
Name	Description	Status		Data type	Document category	Common					
Document number	Document number	Is		Text	All Categories	✓					
Change description	Change description	Active		Text	All Categories	✓					
Revision	Revision			Text	All Categories	✓					
Creator	Creator			Text	All Categories	✓					
Purpose	Describes the intended purpose of the document	ACTIVE		Text	All Categories						

All attributes (5)		Common attributes (4)		Custom attributes (1)		Search by name or description		Add new attribute	
Name	Description	Status		Data type	Document category	Common			
Change description	Change description	ACTIVE		Text	All Categories	✓			
Purpose	Describes the intended purpose of the document	ACTIVE		Text	All Categories				



# Enhancements

## Language settings in Web and CAD plugins<sup>1</sup>

- We have improved and fixed the German translations in our CAD plugins.
- The CAD plugin detects the region settings on your Windows computer and automatically changes to the appropriate language. This currently only works for **English** and **German** languages.
- The Web application detects the language settings of your browser and automatically changes to the appropriate language. This currently only works for **English** and **German** languages. We will continue to improve German language support with further releases.

## Business Processes

- You can select more than one item from the BOM section in a project and send them all to a Change Request. You can also copy multiple items from the BOM and paste them into a Change Request.
- Error messages pertaining to sending an item to a Change Request when it is not in a development state or has already been submitted to another Change Request have been improved to make it clear which items are in error.
- The Notes beside items in the Show Orphans window on a Change Notice are now editable so that you can add your reasons for why you are returning orphans directly in the orphans window.
- We have improved the loading time for Change Request and Change Notice dashboards.
- The project number now appears in the header of a Change Notice.
- The Investigation Request table now shows full column heading names instead of single letters.

# Enhancements

## CAD Plugins

- My Workspace and the Assignments tab both now use the header My Assignments to clarify that these are the assignments specific to you, and not for the entire project or tenant.
- If your assembly contains any suppressed components, a record of them is recorded in the cBOM, but no item is created for it during item creation. If you subsequently suppress a component in your assembly, the record of the suppressed component is still recorded in the cBOM, but the item is not added to the eBOM. The eBOM quantity is summed according to how many instances of the component are unsuppressed in the cBOM.
- During a check in, if Upchain has not detected any changes in the file(s) being checked in, a warning message appears indicating that this is the case and asks if you wish to proceed with check in anyway.
- We are continuously optimizing database interactions so that the loading times of the check out/download windows, item snapshots, locks, Change Requests, Change Notices, and project dashboards are faster. Writing customer properties is also faster for a quicker download and open time<sup>1</sup>.
- You can right-click an item within the Where Used tab and download that item. This provides you with quicker access to parent items.
- When canceling all check outs, you are now prompted with a popup window to confirm your decision to cancel in case you have selected this option by accident.
- The Find Item window now looks and behaves the same as the Advanced Search window, modified to include a button to select your desired item, to provide consistency across the CAD plugin.
- We have introduced a new tenant property named **redownload.files.to.home.folder** that enables you to redownload files from the ProjectBOM to overwrite any files that might already exist in your home folder.

# Enhancements

## NX CAD plugin

- NX 1926 is now supported<sup>1</sup>.
- The process of checking out, checking in, and canceling the check out on items from the cBOM view has been improved such that only the items being checked out<sup>1</sup>, checked in, or canceled are closed and re-opened. This significantly reduces the amount of time these processes complete and ensures unsaved work is not lost.

## Document Management

- You will no longer receive a warning message when checking in an older MS Office version of a file (.doc, .ppt, .xls) that a PDF translation will not be generated for it. The new PDF Viewer can now open these file types.

## Gantt Chart

- We have removed the ability to import from and export to MS Project in the Gantt chart while we work to enhance this functionality.

## Administration

- In the user details panel for inactive users, the Activation Date field now shows a message indicating that the invitation is still pending and their account is not yet activated if the user has not clicked the link in their email to register with Upchain.
- A new tenant property named **enable.manufacturer.on.all.item.types** was added to enable Manufacturer, Manufacturer Item Number, and Manufacturer Item Description attributes on all item types in the Web application only<sup>1</sup>. This property is disabled by default.

# Enhancements

## API Enhancements

- You can now add notes to an item in the Notes field through API<sup>1</sup>. The character limit is 255 characters.
- You can include the unit of measure when creating a new item<sup>1</sup>.
- Translations and visualizations can be regenerated regardless of their previous existence.
- A new API endpoint was added to provide a list of end items for each project when given a list of projects.
- A new API endpoint was added to provide a list of child item versions for each parent item version when given a list of parent item versions.
- A new API endpoint was added to provide a list of Change Requests, including their name, number, workflow, and ID when given a list of item versions.
- An API has been created to allow you to add users directly into Upchain. This endpoint ensures the users are properly added to keycloak as well.
- When adding a new exchange rate, the end date on the previous exchange rate is updated to match the start date of the new exchange rate.

<sup>1</sup> The improvement/feature was previously deployed during our weekly service updates for 5.16.

## Fixes

Fixed: The Upchain login screen now shows "Username" instead of "Email". For the majority of users, username is the same as email address.

Fixed: Users were unable to download translations if the translations had been generated from an API call.

Fixed: Drawings were not being registered to items during check in even though they referenced the registered CAD file, had the same file name, and was saved into the same folder as the CAD file.

Fixed: When setting the date based on constraint type in the Gantt chart, the arrows for navigating between months in the date selector would jump a year instead of a month.

Fixed: When logging into the CAD plugin for SolidWorks and users belonged to multiple tenants, the tenant selector would sometimes become hidden behind other windows.

Fixed: There have been several issues with a customer's local GPS (grid processing server) not correctly updating the status of each job as it processes and finishes.

Fixed: We have improved the wording that describes the Edit released checkbox for Document Categories.

Fixed: The Forgot Password button was not sending an email to users to reset their password.

Fixed: Import of an electrical package with the eBOM designator attribute was hindered due to an incorrect mapping and it was not possible to map it to released items. This has been corrected and the attribute is mapped to the correct eBOM.

Fixed: Items were left in a null state if one user accepted the release and another user rejected the release in a quorum decision during a Change Request. This issue is no longer possible and only the first action will be recognized as a valid one.

Fixed: An item increased its version from Released to Development in the middle of a Change Request and prevented the CR from finishing successfully. This was due to the Update function in the BOM section of Web not checking the parent item's structural lock before updating the item version.

Fixed: When configuring categorization attributes using the drop-down option, text was not being saved into the drop-down options.

Fixed: The Excel plugin was not updating the Recommended Spare attribute.

## Fixes

Fixed: Users with a Viewer licence were able to see items in a Development status, when they should have been restricted to Released items.

Fixed: 'Cancel all check outs' was not clearing all child locks correctly.

Fixed: The BOM quantities were not being calculated correctly when using the Inventor CAD plugin.

Fixed: It is no longer possible to send a floating End item (ie. an End Item with no project association) to a Change Notice.

Fixed: The cBOM section of an item's Specification Documents was not displaying assembly files.<sup>2</sup>

Fixed: The extended cost on a Change Notice was not being properly added up through the tree to the End Item level.<sup>2</sup>

Fixed: The BOM Report was not being generated for any item.<sup>2</sup>

Fixed: German characters used in item attributes were not displaying correctly in the Web application.<sup>2</sup>

Fixed: Users were not able to check in an item that had been submitted to a Change Request that had not started (ie. items were still in a Development state) when the only changes made were to the attributes or drawing notes.<sup>2</sup>

Fixed: Users were unable to check in a CAD model that contained over 2100 BOM anomalies.<sup>2</sup>

Fixed: Tasks in the Gantt chart would not load if there was a newer version of the workflow to which they were assigned.<sup>2</sup>

Fixed: The Export to Excel function was not correctly populating the Recommended Spare and eBOM Spare attributes.<sup>2</sup>

Fixed: Advanced search for items within specific projects was still returning items that had been previously removed from the project.<sup>2</sup>

Fixed: The terminology of the Manufacturer Item Number and Manufacturer Item Description was not consistent in the Advanced Search results in the Web application.<sup>2</sup>

Fixed: The Manufacturer Item Number and Manufacturer Item Description columns were not displaying information in the CAD plugin Advanced Search results.<sup>2</sup>

## Fixes

Fixed: The Item View was not properly updating as you selected child items in the feature manager tree in SolidWorks if the cBOM view had not been previously refreshed.<sup>2</sup>

Fixed: Load times of the Gantt chart have been improved by only loading what's needed and storing what has been loaded in cache.<sup>2</sup>

Fixed: Users were unable to download very large assemblies from the CAD plugin.<sup>2</sup>

Fixed: Visualization server connections are now properly closed when the 3D viewer is closed.<sup>2</sup>

Fixed: The recent visualization server upgrade resulted in the Supplier portal not loading properly.<sup>2</sup>

Fixed: Marking a project as favorite from the CAD plugin resulted in an error message even though the project was still favorited.<sup>2</sup>

Fixed: Duplicate translations were appearing in Advanced Search results in the Web application.<sup>2</sup>

Fixed: Import of an electrical package was hindered due to a 50 character limit imposed on certain cells. The limit has been increased where necessary.<sup>2</sup>

### API Fixes

Fixed: Creating a file with German characters in the name failed to write custom properties correctly, and thus failed to register the file correctly.<sup>2</sup>

Fixed: The progress status when running the BOM report through API is now properly updated even when the process is terminated.<sup>2</sup>

Fixed: It was not possible to create file versions past v009.<sup>2</sup>

Fixed: Duplicate file translations were being shown in search results.<sup>2</sup>

<sup>2</sup> The fix was previously deployed during our weekly service updates for 5.16.



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