



DIGITAL TRANSFORMS PHYSICAL

# WINDCHILL MODELER 9.5 – WHAT'S NEW

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*Product Manager*

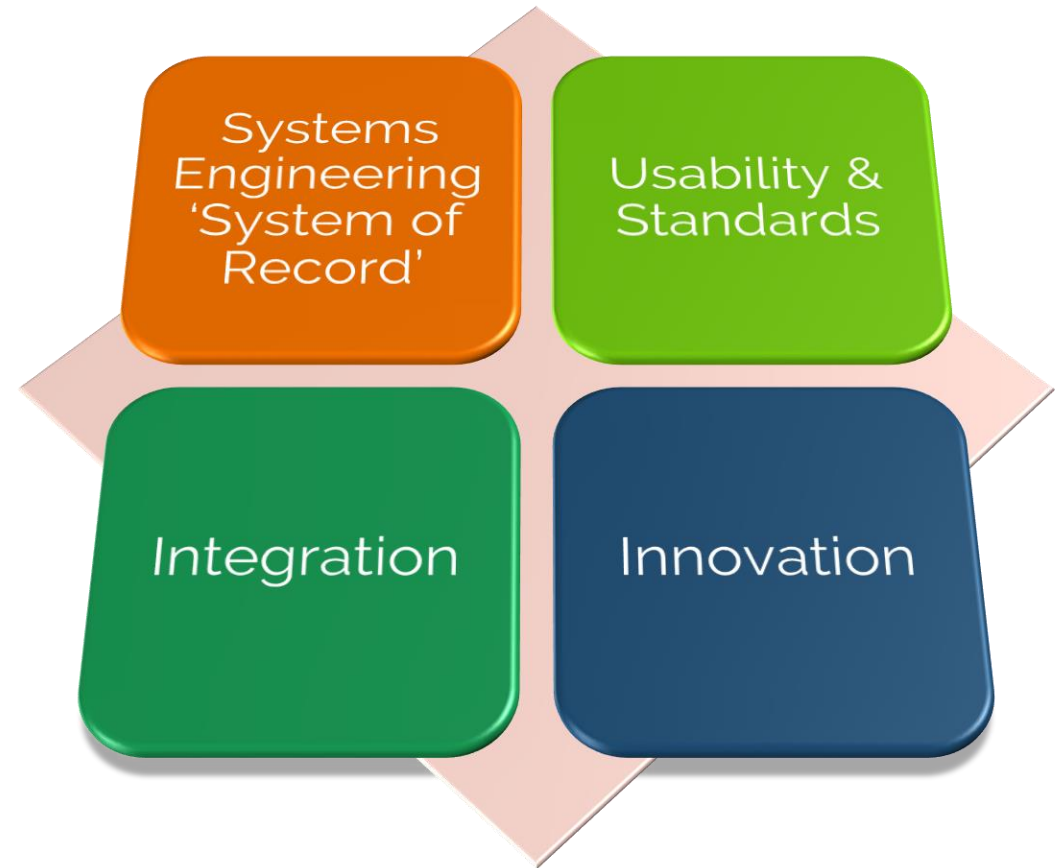
*Systems & Software Engineering*



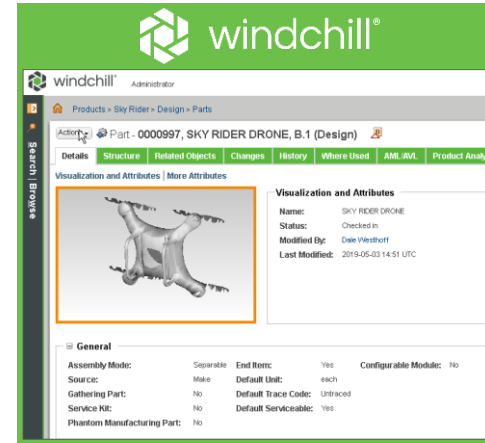
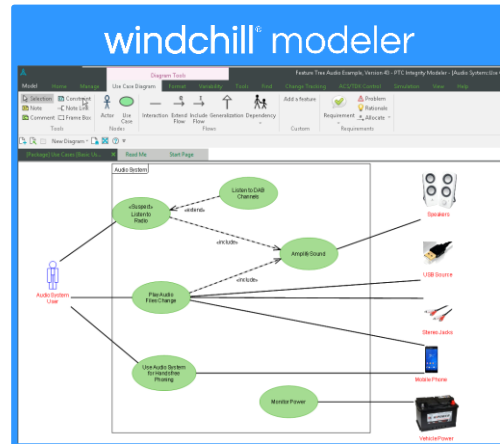
February 2022

# WINDCHILL MODELER – FOUR STRATEGIC OBJECTIVES

- Systems and Software Engineering 'System of Record'
  - Pervasive, scalable & multi-user
  - Enterprise deployment
- Stunning user experience
  - Contemporary and performant
  - Standards-based Modeling
- Integration
  - Digital thread, enabled with OSLC
  - Automated Code Synchronization (ACS)
  - Co-simulation with 3<sup>rd</sup> Parties
- with Continual Innovation
  - Product Line Engineering (Variability)
  - Modular System of Systems (SoS)
  - Model Driven IoT...



# ENGINEERING DIGITAL THREAD



windchill® rv&s

Requirements

windchill® modeler

MBSE

Functions

windchill® modeler

MBSE

Logical Structure

windchill®

Physical Structure

windchill® rv&s

Software

Jira

GIT

Matlab / Simulink

Doors

...

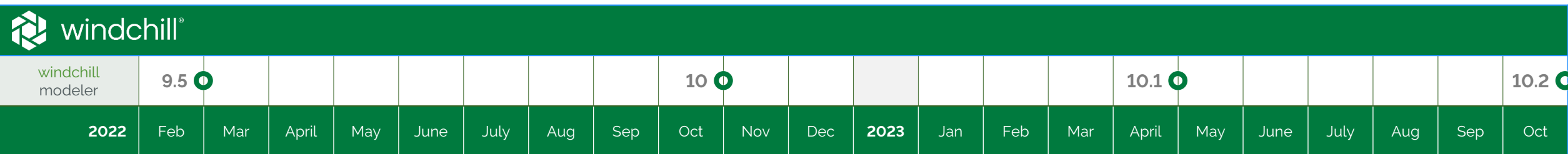
3rd Party

windchill® rv&s

windchill® modeler

Validation

# windchill® modeler - PRODUCT ROADMAP



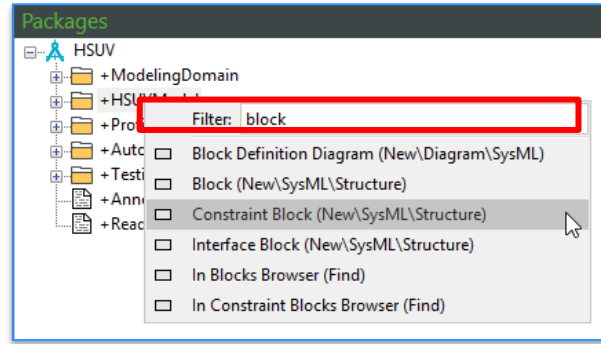
windchill modeler Releases	Themes
windchill modeler 9.4 – May 2021	Diagramming, Reviewer, Packages, OSLC & ASAL
windchill modeler 9.5 – Feb 2022	Usability, OSLC, Performance
windchill modeler 10 – Oct 2022	SysML 2.0, OSLC, RTF, Reviewer
windchill modeler 10.1 – Apr 2023	SysML 2.0, OSLC, Software Engineering, Model Management
windchill modeler 10.2 – Oct 2023	Usability, Model Management, Test Management, Advanced PLE
windchill modeler 10.3 – Apr 2024	Usability, Web Interface, Windchill PDMLink Integration, Simulation
windchill modeler 10.4 – Oct 2024	OSLC, Windchill PDMLink Integration, REST, Creo Integration

# WINDCHILL MODELER 9.5

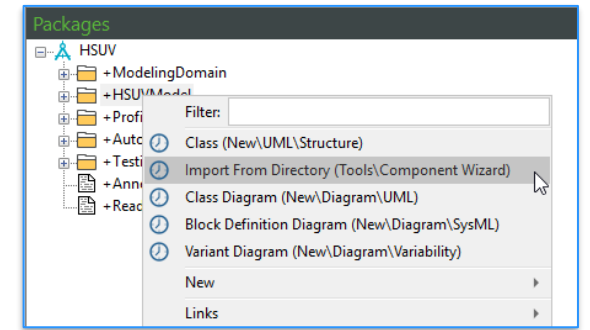
Usability, OSLC, Performance

- Usability
  - Simplified & Productive Item Creation
  - Context menu filtering
  - Frequently used functions
  - Auto-routing optimization
- OSLC Client for Polarion
  - Requirement traceability with Windchill Modeler
- OSLC Integration with DOORS Next
  - Nested global configurations
- Performance
  - Improved performance for reconcile and rebase
- User Help

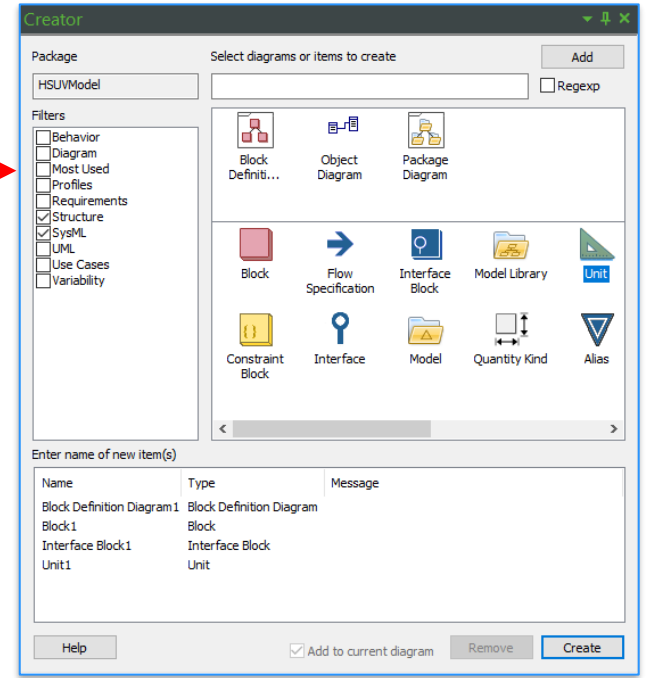
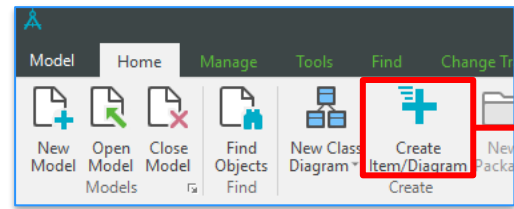
Context menu filtering



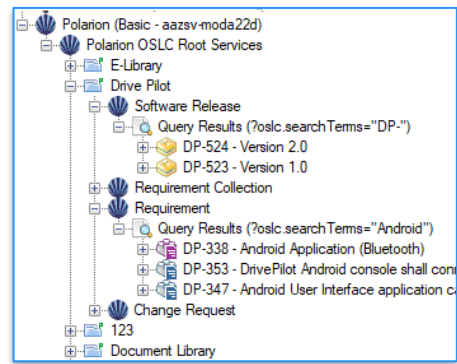
Frequently used functions



Simplified item creation



OSLC Client for Polarion



Planned for Feb 2022

# SIMPLIFIED & PRODUCTIVE ITEM CREATION

- Windchill Modeler 9.5 makes it easier for you to create model items and diagrams with the Creator tool
  - Create multiple items and diagrams of different types easily and quickly - in one operation
  - Add new items to the active diagram
  - Use filters and search to easily locate the type you want to create
  - Works with all types of model and profile
  - Modern user experience makes it easy to learn and use

The image shows the Windchill Modeler 9.5 Creator tool interface. A red box highlights the 'Create Item/Diagram' button in the top toolbar. A blue box highlights the search bar in the Creator window, with a callout stating 'Simple text search and regular expression search'. Another blue box points to the 'Filters' section, with a callout stating 'Narrow down items with filters'. A third blue box points to the search input field, with a callout stating 'Enter name or use default'. A fourth blue box points to the 'Add to current diagram' checkbox, with a callout stating 'Add items to current diagram'. A fifth blue box points to the icons in the main area, with a callout stating 'Double-click icons to add diagrams or items'. The main area displays a grid of icons for various diagram types, including Block Definition Diagram, Object Diagram, Package Diagram, Block, Flow Specification, Interface Block, Model Library, Unit, Constraint Block, Interface, Model, Quantity Kind, and Alias. The bottom of the window shows a table for entering the name of new item(s) and buttons for Help, Add to current diagram, Remove, and Create.

Simple text search and regular expression search

Narrow down items with filters

Enter name or use default

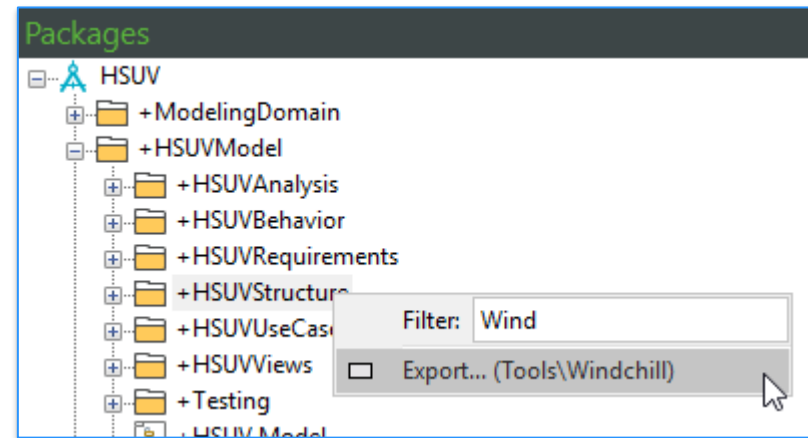
Add items to current diagram

Double-click icons to add diagrams or items

Name	Type	Message
Block Definition Diagram1	Block Definition Diagram	
Block1	Block	
Interface Block1	Interface Block	
Unit1	Unit	

# CONTEXT MENU FILTERING

- It's now faster and easier to locate functions on right-click context menus
  - A simple text filter is provided which simplifies the menu to only the matching functions
  - For example, type in "Use" to view all use case related functions only
  - This feature helps to guide new users with a simple way to locate functions, making it easier to create models
  - Existing users have a rapid way to get to functions making them more productive



Context menu filtered using text "Wind"

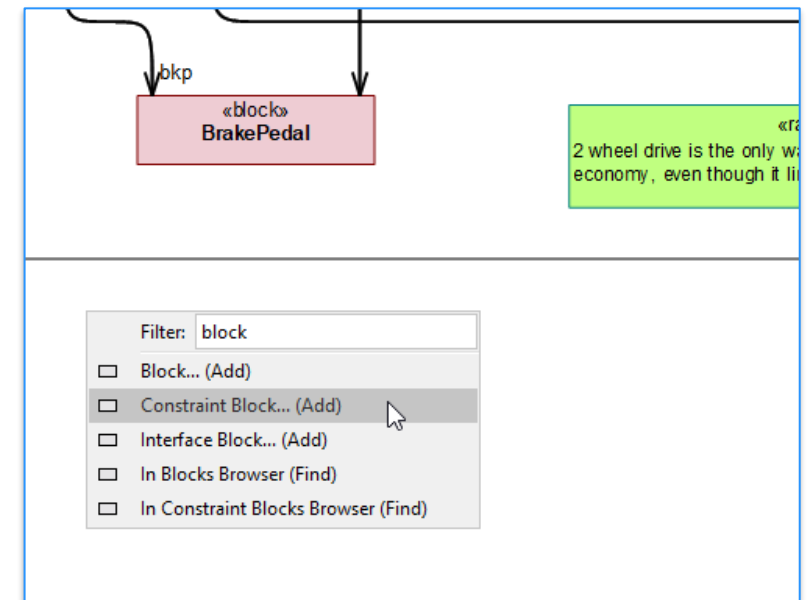
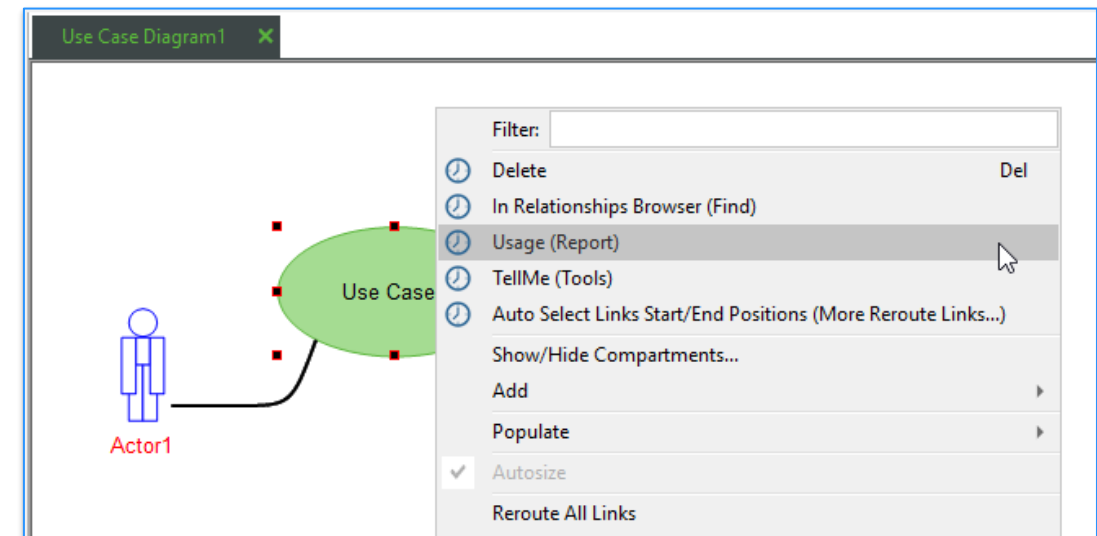
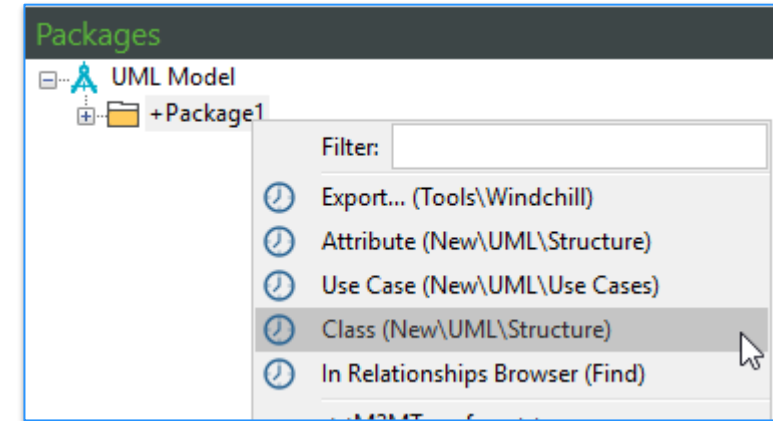


Diagram context menu filtered using text "block"

# FREQUENTLY USED FUNCTIONS

- Functions that have been used frequently are now pinned to the top of the context menu
  - This ensures the functions you use most often are easily accessible
  - 5 most used functions within that context are listed
  - Displayed on all context menus (e.g. on diagrams)
  - Frequent functions are recorded per model

*Frequently used functions in Packages browser*



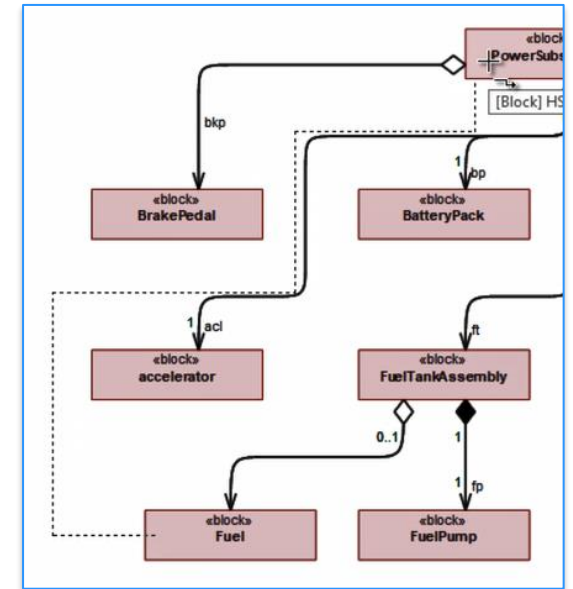
*Frequently used functions on Diagrams*



# AUTO-ROUTING OPTIMIZATION

- Link auto-routing has been optimized to improve routing results and provide the user with more control
  - Fewer lines crossing other lines or other symbols
  - More direct auto-routing
    - Use ALT to disable auto-routing
  - Automatically re-route links when a symbol is resized
    - Including when compartment settings change
  - Retain manual waypoints
  - Auto-routing Profile
    - Control priorities of routing algorithm
    - Disable auto-routing for specific diagrams, or diagram types

*Auto-routing  
avoiding  
crossed lines*



*Auto-routing  
Profile*

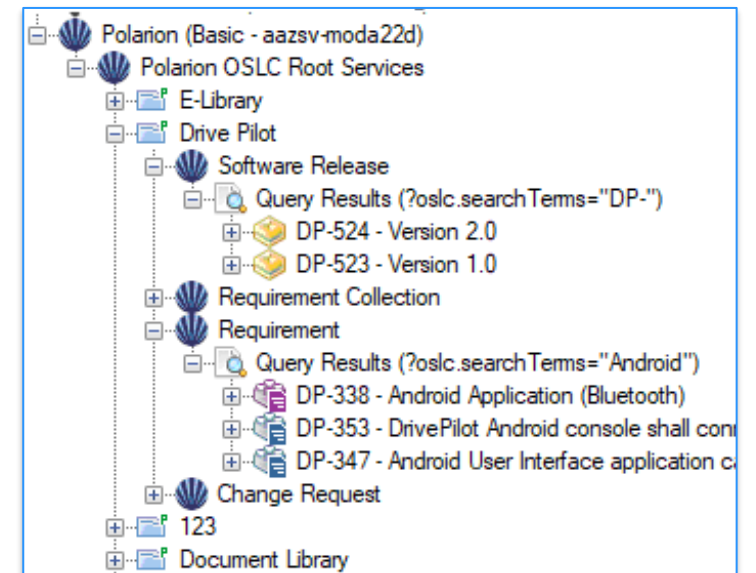
Properties of 'HSUVUseCases [Operational Use

Tag Definition Name	Tag Value
AR RouteLinksAutomatically	TRUE
AR RouteLinksOnMove	TRUE
AR TryCrossAvoidance	TRUE
AR VertexCost	1000
AR TripleTurnCost	1000
AR CrossCost	1000
AR ExtraBoxBorder	80
AR LineBoundaryThickness	1
AR OppositeSideFreedomOnMove	FALSE

# POLARION OSLC CLIENT

- Windchill Modeler 9.5 provides design traceability with Siemens Polarion
  - Capture and manage digital product traceability from system models to requirements
- Standard OSLC client functions allow you to:
  - Search for remote requirements in Polarion
  - View preview pages
  - Use drag-and-drop to create OSLC Links and Surrogates, pointing to the relevant requirements
  - Navigate from Modeler to linked requirements in Polarion
  - Manage changes with OSLC link suspecting

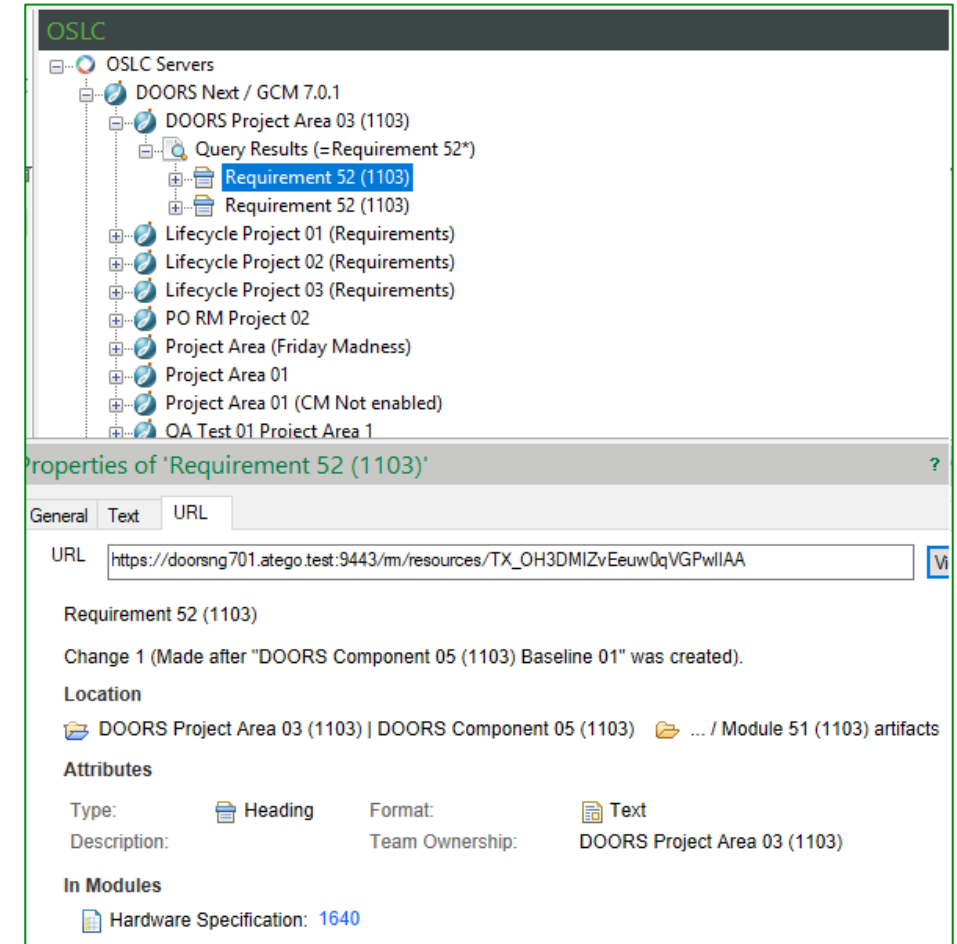
*OSLC Client for Polarion*



**Note: Requires Polarion 22 R1**

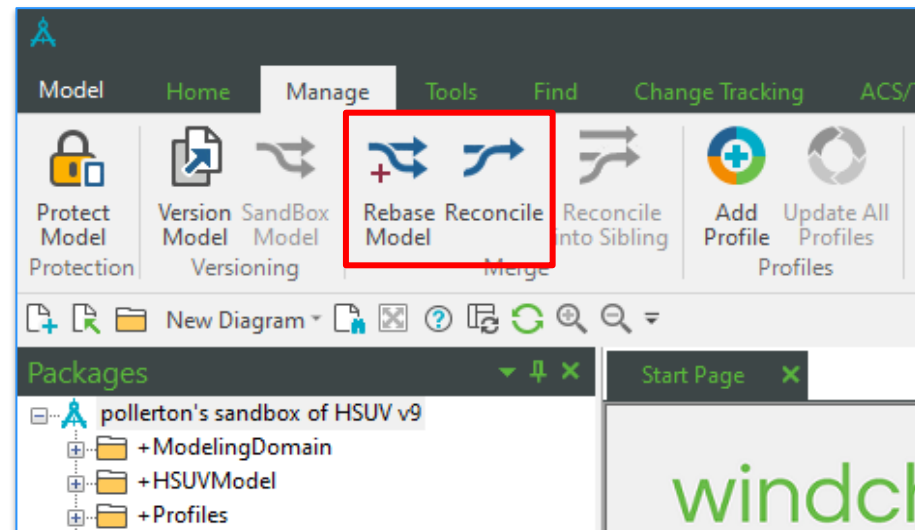
# OSLC INTEGRATION WITH DOORS NEXT

- OSLC client for DOORS Next can now work with nested global configurations



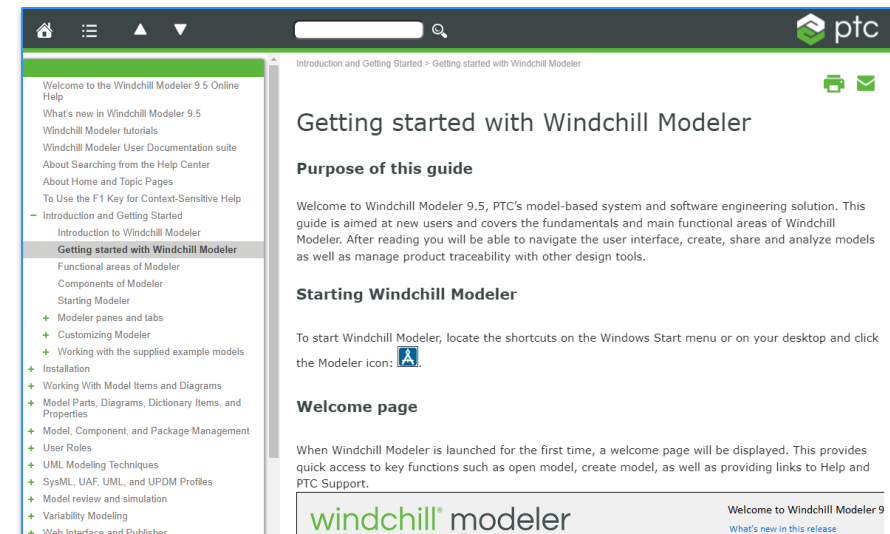
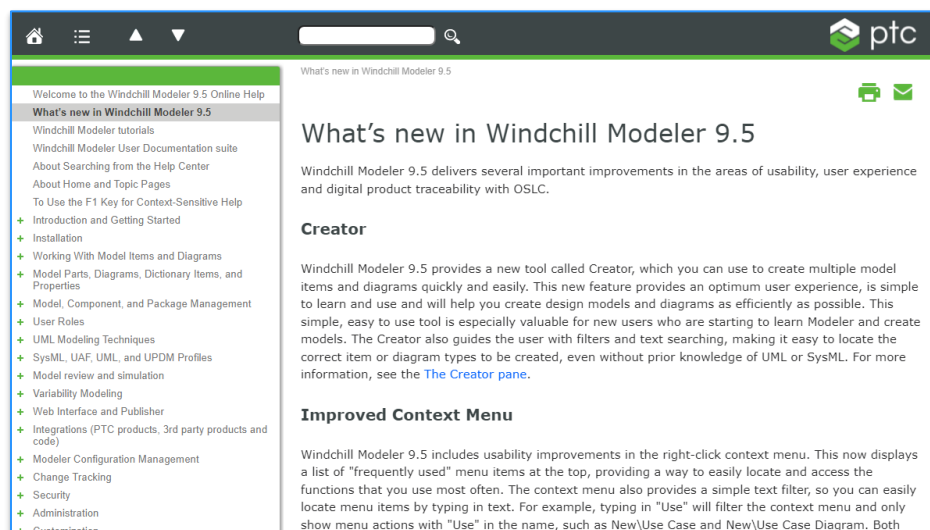
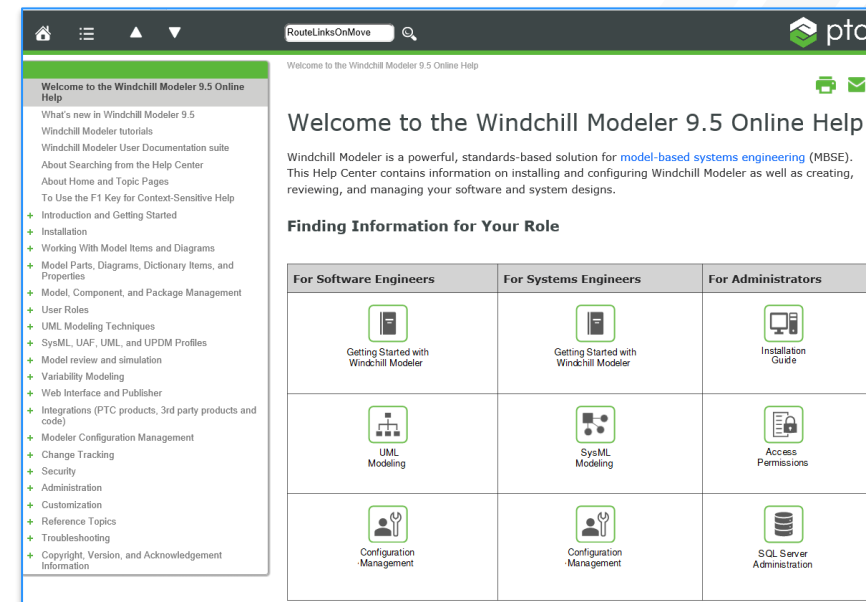
# PERFORMANCE

- Improved performance for reconcile and rebase with large models



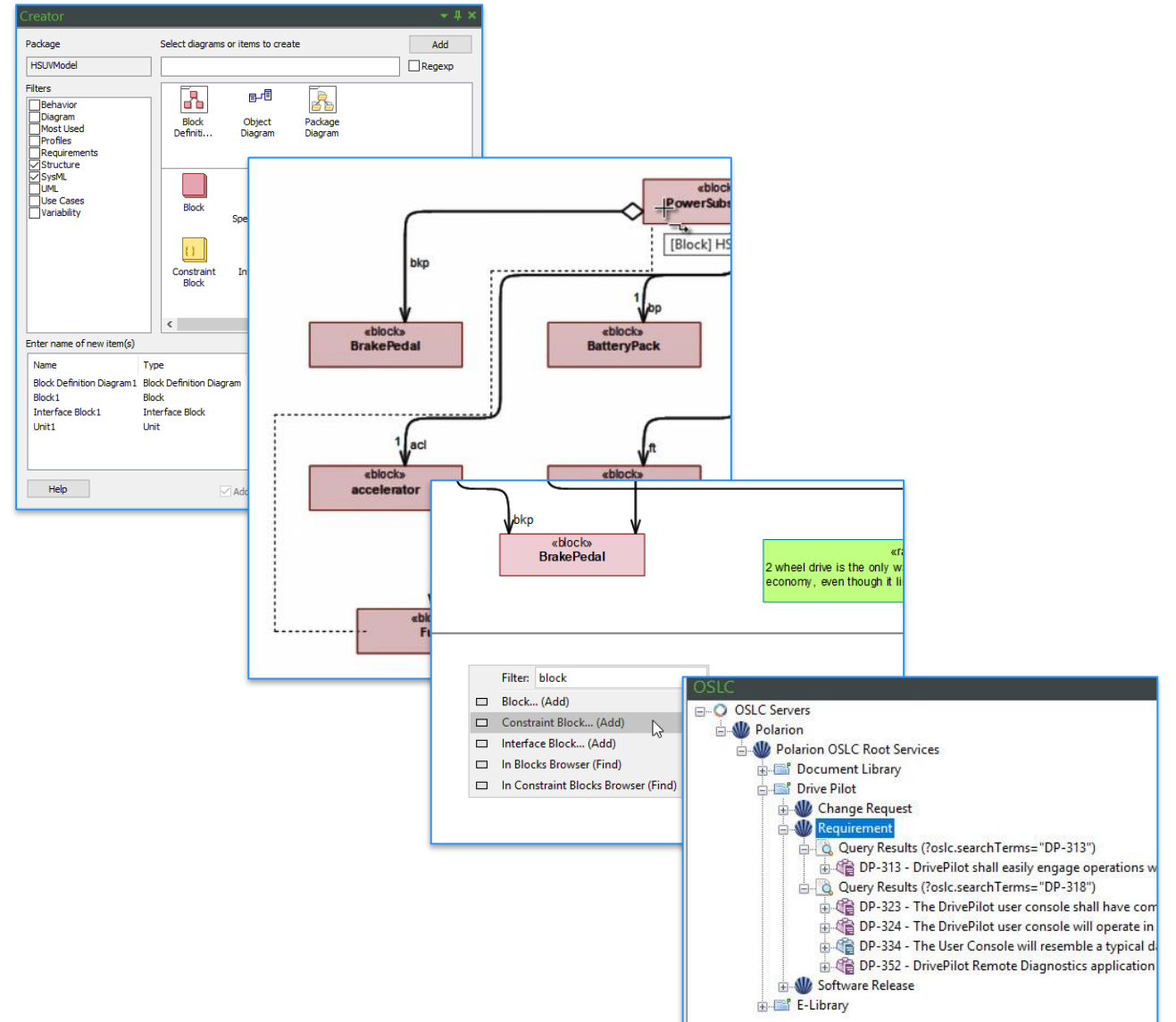
# USER HELP

- Role-based Welcome page helps to guide new users
- Updated Getting Started Guide



# SUMMARY

- Windchill Modeler 9.5 delivers important improvements to:
  - Usability
  - OSLC Client for Polarion
  - OSLC Integration with DOORS Next
  - Performance
  - Help





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# THANK YOU

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