

# Teamcenter for bill of materials management

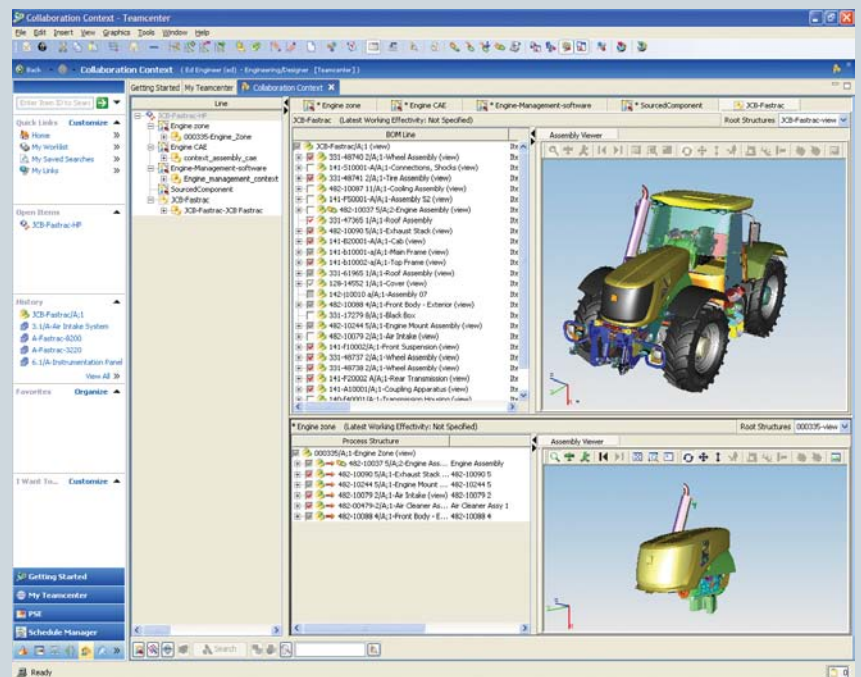
## Managing BOM-related product definitions across the entire product lifecycle

### Benefits

- Enable product teams to meet quality, time, market and cost requirements by providing total and accurate visibility into your BOM product definitions and configurations
- Facilitate flexibility and re-use by providing product teams with full understanding of overarching product platforms that support multiple options, variants and derivatives
- Improve speed-to-market by synchronizing upstream and downstream BOMs, thereby enabling better cross-discipline coordination
- Improve team and personal productivity by ensuring lifecycle participants that they are working with the right configurations and right working versions of the right product definitions

### Summary

Teamcenter® software's bill of materials (BOM) management capabilities help you manage increasingly complex products by providing total visibility into your product definitions and configurations and the way this information evolves throughout the product lifecycle. Teamcenter enables all lifecycle participants to leverage BOM information relevant to their functional needs. Especially valuable when used in conjunction with Teamcenter configuration and change management capabilities, BOM management lets you manage product platforms, variants and derivatives essential for improving your product customization and re-use.



You can use Teamcenter BOM management capabilities to understand how product definitions and configurations evolve across an entire product lifecycle. These capabilities allow you to maintain the accuracy of the

TEAMCENTER

[www.siemens.com/teamcenter](http://www.siemens.com/teamcenter)

SIEMENS

## Teamcenter for bill of materials management

### Features

Product configuration and BOM management

- Manage BOM structure and link any type of data to the product lifecycle
- BOM markup and rollup capabilities allow users to visualize the effect of design changes and configuration selections in real time
- Alternate, substitute and spare part management enables allowed alternatives to be specified during design, thereby preventing unavailable primary parts from stopping production

Process-specific data structure and data management

- Traditional business BOM management can be extended to product lifecycle stages beyond design and engineering
- Alignment capabilities link the content of multiple representations, thereby reducing duplicate work

Lifecycle representation management

- Revision management and effectivity capabilities accurately control and configure product information as it evolves
- Auditing tools provide visual feedback on what product information is complete and what still needs to be done
- Advanced where-used and where-referenced tools facilitate the understanding of change impact

product's BOM information, manage engineering changes across multiple configurations, synchronize downstream BOMs and manage BOM changes across product variants.

Teamcenter enables you to relate and consolidate representations that contribute to your product definition as these definitions evolve across the entire product lifecycle. This provides your product teams with total visibility into your as-designed, as-planned, as-built, as-manufactured and as-delivered product configurations.

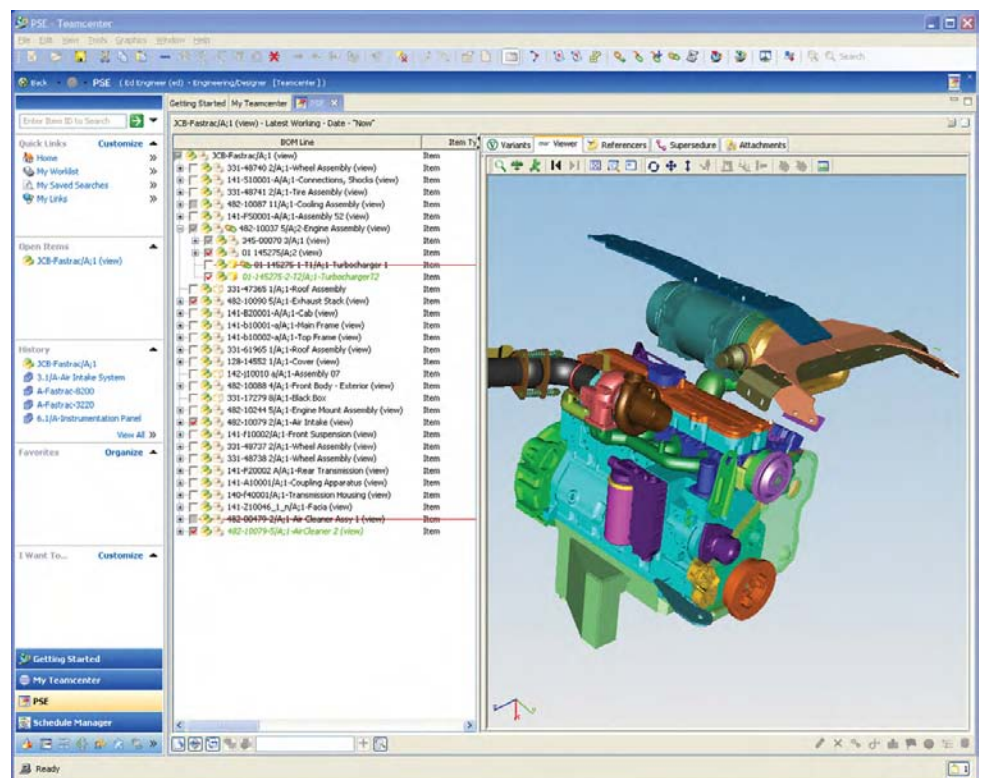
Teamcenter data-neutral BOM management tools enable you to structure and link all types of data to your product lifecycle. You can use Teamcenter to consolidate the definition of multiple product offerings by leveraging their commonality, thereby providing a basis for your re-use initiatives. Product teams can use Teamcenter BOM markup and rollup capabilities to determine the real-time effect of design changes or configuration selections.

Design teams can also define allowable alternate and substitute parts so that manufacturing teams can select a defined alternative and keep the assembly process going when the primary part is unavailable.

You can use Teamcenter to support traditional BOM business management objectives – such as releasing parts to production – as well as to extend BOM management to other lifecycle activities, including requirements definition, simulation, manufacturing, sourcing and maintenance, repair and overhaul (MRO).

Teamcenter auditing tools facilitate accountability and completeness checking by providing visual feedback about what product information is complete and what information is still in progress.

You can use Teamcenter where-used/where-referenced capabilities to make certain that lifecycle stakeholders understand the full impact of proposed design changes.



**Features *continued***

## Context management

- Advanced context management capabilities allow stakeholders to view product definitions and configurations in a time or feature-based perspective relative to their lifecycle function
- Accountability tools enable product team members to understand how the content of their product “view” relates to, is common to or is uniquely different than other product “views”

## Open application and systems management

- Support integration with other enterprise applications, like ERP, to pass BOM information back and forth between PLM and ERP to eliminate errors of re-entry

You can leverage BOM management in conjunction with Teamcenter context management capabilities to enable individual product team members to “view” the product configuration within a time or feature-based perspective unique to their task or role. Teamcenter facilitates this by tying product configurations and their definitions to real-world work breakdown structures.

Equally important, Teamcenter enables team members to understand how their “views” and functional roles pertain to views and roles of other teams and lifecycle participants.

**Business challenges**

Turning a product into profitable reality is not easy. You need to coordinate the efforts of many people to meet a common goal. Today’s companies deal with increasing levels of product complexity, including the need to support segmented markets, personalized consumer preferences and rapidly rising technology advances.

Your company needs to coordinate parts, assemblies, subsystems and systems developed, manufactured or supplied by different groups using different software.

Coordinating these deliverables forms the basic elements of a product in the terms of its offerings, systems, assemblies and basic parts, as well as its manufacturing. Managing the bill of materials is a critical element for any company.

With increasingly complex products, shorter lead times, and more advanced and varied product offerings, it becomes progressively more difficult to maintain the accuracy of your BOM information. Managing engineering change across configurations, keeping downstream BOMs synchronized and managing BOM changes across variants adds to product complexity.

BOM management is a critical part of designing and manufacturing any product. Your teams need tailored visibility to central product information by role, and extended configuration management beyond the bill of materials to include a richer product definition. This leaves companies struggling to improve their quality and time to market, while reducing development, manufacturing and product lifecycle costs in order to remain competitive.

Contact  
Siemens PLM Software  
Americas 800 498 5351  
Europe 44 (0) 1276 702000  
Asia-Pacific 852 2230 3333

[www.siemens.com/teamcenter](http://www.siemens.com/teamcenter)

© 2011 Siemens Product Lifecycle Management Software Inc. All rights reserved. Siemens and the Siemens logo are registered trademarks of Siemens AG. D-Cubed, Femap, Geolus, GO PLM, I-deas, Insight, JT, NX, Parasolid, Solid Edge, Teamcenter, Tecnomatix and Velocity Series are trademarks or registered trademarks of Siemens Product Lifecycle Management Software Inc. or its subsidiaries in the United States and in other countries. All other logos, trademarks, registered trademarks or service marks used herein are the property of their respective holders.  
X3 13426 5/11 B