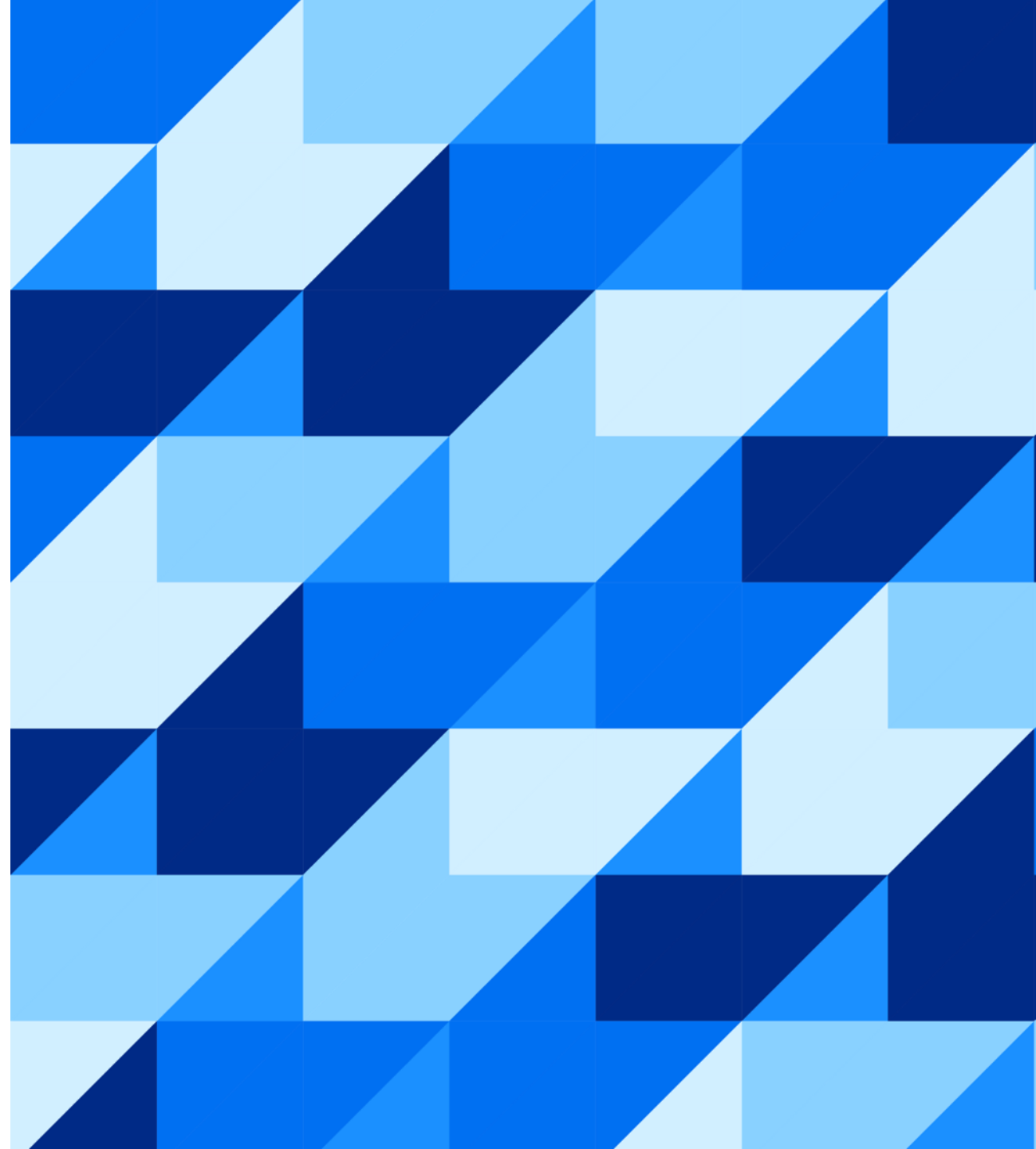# Integration of Material and BOM Maintenance
in MDG, Central Governance

MDG Product Management, SAP
May 01, 2024

Public

Solutions to Support Different Requirements
In terms of function, scope, and governance process

As a master data steward, I want to have a linked governance process while creating a material and its Bill of Materials (BOM) in Master Data Governance (MDG).

There are diverse ways to support the creation of BOM while utilizing MDG Material depending on the requirements to be met:

1. SAP PLM and SAP Master Data Governance for Material

    → Available as SAP consulting solution

2. Simple BOM in enhanced data model/process for MDG for Material

    → How To Guide, How-To Guide for Side Panel, SAP Help Portal for Business Context Viewer (BCV)

3. Additional steps after activation in material change request (CR)

    → SAP Note 2765664 and 2742813 starting from S/4HANA 1511 and MDG 8.0

4. Material change request triggers follow-up BOM change request

    → How to Guide, available with SAP MDG, EAM extension by Utopia starting from S/4HANA 1909 SP01

5. BOM change request triggers change request for material

    → SAP Help Portal for SAP MDG, EAM extension by Utopia, available with SAP MDG, EAM extension by Utopia starting from S/4HANA 1909 SP01

1. SAP PLM and SAP Master Data Governance for Material (1 of 2)

Joint Value Proposition

SAP PLM allows customers to manage their product data along the entire product life cycle from idea through portfolio management, engineering, release processes, and costing to handover to manufacturing and service.

SAP MDG provides central governance of master data material, supplier, customer, financial and custom domains.

For many customers looking for a complete solution in the product space, both solutions are needed.

- SAP PLM orchestrates the processes of managing product data.

- MDG provides detailed governance, control and data quality over the creation and update of data material data used in transactional, analytical and reporting systems.
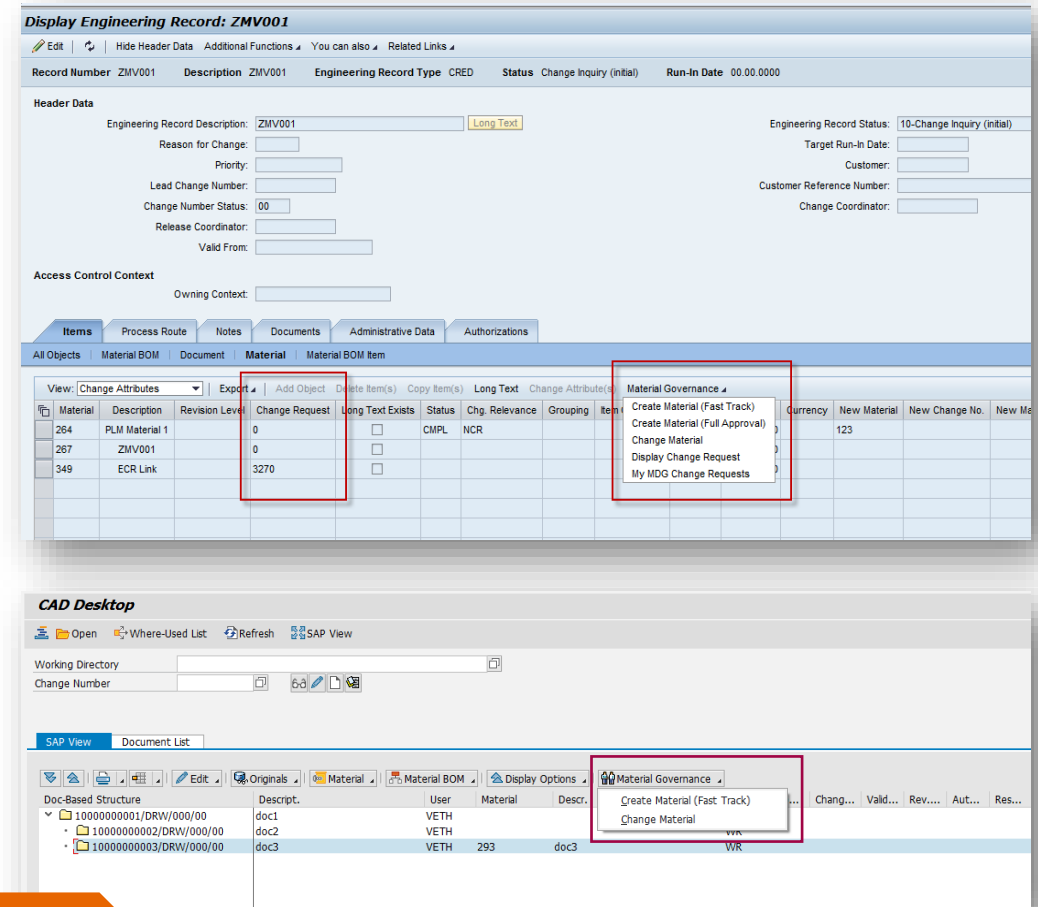
1. SAP PLM and SAP Master Data Governance for Material (2 of 2)
Process Integration Scenarios

In this solution, PLM integration scenarios are enabled:

- PLM Engineering Record
  - o Create new material
  - o Change existing material
  - o Check status change request

- CAD Desktop
  - o Create new material
  - o Change existing material

It is available as SAP Consulting solution and the concept is reusable for integration into other objects.

PLM Engineering Record → MDG-M CR → PLM Engineering Record

2. Simple BOM in Enhanced Data Model/Process for MDG for Material

In this solution, the data model "MM" is extended. This is only recommended for simple BOMs.

- Option 1: Entity type 1 and own access class
- Option 2: Entity type 4 using BAdI MDG_BS_MAT_API_SEGMENTS_EXT ([How To Guide](#))

In addition, the side panel can be used to show additional BOM information (for example: structure and quantity information of the sales BOM, validity of BOM, display BOM) in Master Data Governance for Material processes. More information can be found here: [How-To Guide](#) and SAP Help Portal for [Business Context Viewer (BCV)](#).

CR Basic Data → … → CR Component List → … → CR Activation → BOM Creation

3. Additional Steps After Activation in Material Change Request

In this solution, additional steps after the activation step are defined. In other words, the workflow no longer has to end after a CR has been activated successfully.

Instead, after a CR has been activated, further actions can be performed to trigger additional dialog workflow steps. A workflow item for these additional steps can then be found in the workflow inbox of the user who has been assigned accordingly. In this additional step a link to the BOM maintenance UI can be shown on the UI and the user can maintain the BOM and confirm this in the CR.

This is available starting from S/4HANA 1511 and from MDG 8.0 with SAP Note 2765664 and 2742813.

| CR Basic Data | … | CR Activation | CR Link to BOM Transaction | CR Final Step |

4. Material Change Request Triggers Follow-Up BOM Change Request

SAP MDG, EAM extension by Utopia with S/4HANA 1909 SP01 can be used to request, approve, and execute changes for BOM objects as well as replicate those changes to decentralized systems.

In this solution scenario, the process starts in MDG for Material with a request for the creation of a material. The governance processes are being executed in MDG for Material until final activation of the material.

After activation, a follow-up change request is being created for the BOM of this material using SAP MDG, EAM extension by Utopia.

The governance process for the BOM continues in SAP MDG, EAM extension by Utopia until activation. This How to Guide describes the solution to automatically trigger a new material BOM change request after the activation of the material change request.

| CR Material | CR Material Activation | CR BOM | CR BOM Activation |

5. BOM Change Request Triggers Change Request for Material

[SAP MDG, EAM extension by Utopia](#) with S/4HANA 1909 SP01 can be used to request, approve, and execute changes for BOM objects as well as replicate those changes to decentralized systems.

In this solution scenario the process starts in SAP MDG, EAM extension by Utopia with a change request for a new BOM. The user can request new components using a material change request if the components don't exist in active area.

The BOM change request can be activated only after all the dependent material change requests are approved. The BOM change request activation process will trigger the activation of dependent material change requests. All approved material change requests will get activated first and then BOM change request will get activated.

CR BOM → CR Material(s) → CR Material(s) Approval → CR Material(s) Activation → CR BOM Activation

4./5. Integration of Material and BOM Governance Processes

Demo

Material CR triggers follow-up BOM CR ->
How to Guide, available with SAP MDG, EAM extension by Utopia starting from S/4HANA 1909 SP01.

BOM CR triggers CR for Material ->
available with SAP MDG, EAM extension by Utopia starting from S/4HANA 1909 SP01. SAP Help Portal for SAP MDG, EAM extension by Utopia.

Thank you.

Contact information:

SAP Master Data Governance Community: https://community.sap.com/topics/master-data-governance
SAP Master Data Governance Features: https://www.sap.com/products/master-data-governance/features.html
MDG Roadmap: https://roadmaps.sap.com/board?PRODUCT=901B0ED1A0641EDA9FF75276E440C0EF&
SAP Help Portal for MDG: https://help.sap.com/viewer/product/MASTER_DATA_GOVERNANCE/OVERVIEW/en-US