

Create Material Master – company code level

Covers process: 0211 create material master

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EMEA Process Team

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EVERY CONNECTION COUNTS

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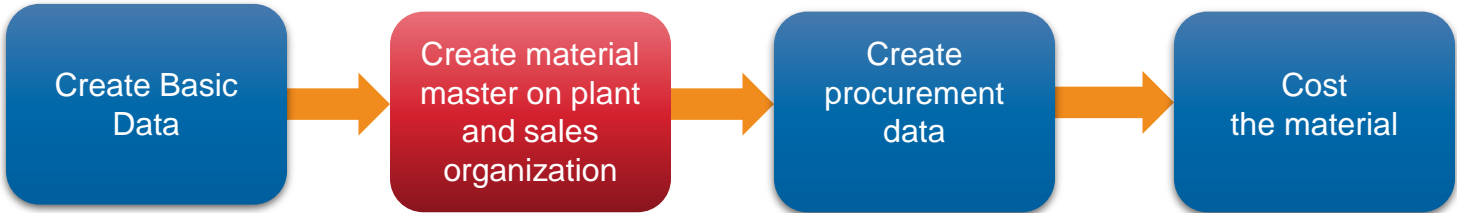
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Executive Summary

This training gives an overview how to set up the material master on company code level, using the streamlined transactions

1. [ZCML – create material master](#)
2. [ZDML – create default values](#)

Process flow



Required Security

CMATXAXXXX	Maintain Material MD (Production)
CMATXUXXXX	Update Material MD (Production) - Restricted
FMATXAXXXX	Maintain Material MD (Accounting)
KMATXAXXXX	Maintain Material MD (Costing)
LMATXAXXXX	Maintain Material MD (Warehouse)
QMATXAXXXX	Maintain Material MD (Quality)
XMATXAXXXX	Maintain Material MD (Plant Views)

XXXX stays for company level like CH1X for TESOG 1151 or DE1X for Germany 0406

Additional roles if XMATXAXXXX is **not** requested:

MMATXAXXXX	Maintain Material MD (Purchasing)
VMATXAXXXX	Maintain Material MD (Sales)

Create new materials via ZCML

EVERY CONNECTION COUNTS

ZCML Overview & Purpose

Transaction for creating material master logistics views with a streamlined process.

Value proposals gathered from

- Tyco Electronics Data warehouse (TED),
- Transfer Pricing Excellence database (TPEX),
- Material Master Default Values custom table (ZMMDEFAULT),
- User Parameters (PIDs) and
- MRP Profiles

User can review and modify the proposed values within a single screen.

Standard MM01 transaction is called in the background to create the Material Master views.

ZCML Initial Screen

Material number

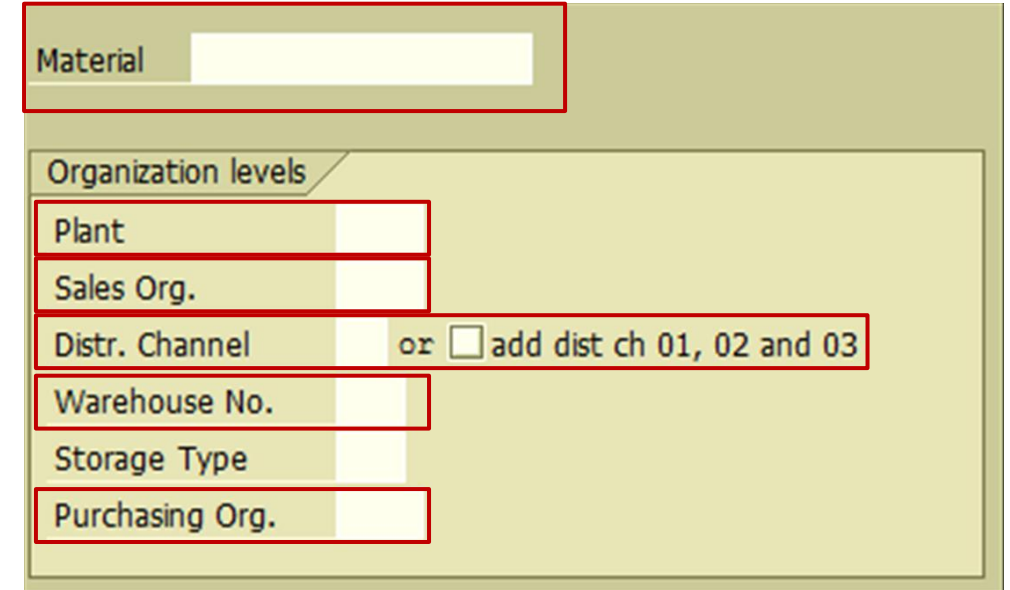
Plant ID to create views like

- Sales Plant and Foreign views
- Purchasing view
- MRP views
- Costing / Accounting views
- Storage / Warehouse views

Sales Org and Distr. Channel to create Sales Org views

Warehouse No. to assign a warehouse number to a material

Purchasing Org. to assign purchasing organization for external procured materials



The screenshot shows the ZCML Initial Screen form. It has a light beige background. At the top, there is a label 'Material' followed by a text input field. Below this is a section titled 'Organization levels' with a diagonal line. Under this section, there are several rows, each with a label and a text input field: 'Plant', 'Sales Org.', 'Distr. Channel', 'Warehouse No.', 'Storage Type', and 'Purchasing Org.'. To the right of the 'Distr. Channel' input field, there is a checkbox and the text 'add dist ch 01, 02 and 03'. All the input fields and the checkbox area are highlighted with red rectangular boxes.

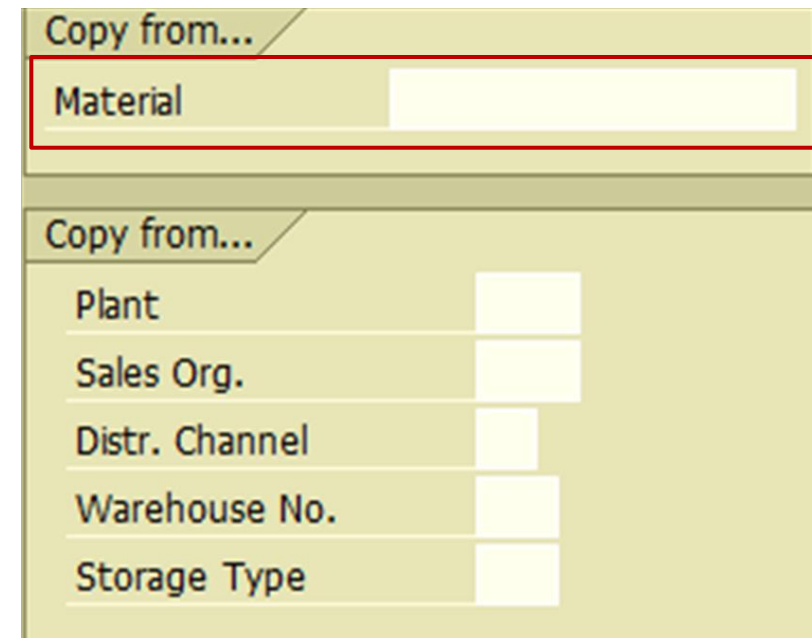
ZCML Initial Screen

You can copy

- defaults from an existing MRP profile
- data from an existing material number



Profiles	
MRP profile	<input type="text"/>



Copy from...	
Material	<input type="text"/>

Copy from...	
Plant	<input type="text"/>
Sales Org.	<input type="text"/>
Distr. Channel	<input type="text"/>
Warehouse No.	<input type="text"/>
Storage Type	<input type="text"/>

ZCML Source Selection

If the new product can be sourced by several interco suppliers available on TPEX you will be requested to select one source from the list.

Once you selected a source from the list some data like MOQ, lead times, costs, etc. will be populated on the next screen automatically.

If only 1 source available, pop-up screen is not shown and data is immediately used.

Create Material - plant-specific views: proposed values

Tyco Product Source comparison data

Source	Source Name	True Cost	R	U...	CO	Rev	LT	Pkg	Std PkQ	Unit PkQ	Alt PkQ
1398	Tyco Eletro-Eletro...	11.69196 USD	M	PC	BR	R	42	REL	13000	13000	52
1082	U.S. Operations o...	7.056 USD	M	PC	CH	R	101	REL	13000	13000	52
0453	TE AMP Guangdo...	.79722 USD	C	PC	CN	R	36	REL	13000	13000	52
1473	TE (Shanghai) Co...	.7766316 USD	C	PC	CN	R	36	REL	13000	13000	52
1641	TE (Suzhou) Ltd.	7.5245184 USD	M	PC	CN	R	28	REL	13000	13000	52
1698	TE Technology (K...	.7357644 USD	C	PC	CN	R	27	REL	13000	13000	52
0406	TE AMP (Germany...	.5964 USD	C	PC	DE	R	2	REL	13000	13000	52
2183	TE Connectivity M...	.62338 USD	C	PC	DE	R	20	REL	13000	13000	52
0439	TE AMP Espana, S...	6.69246 USD	M	PC	ES	R	35	REL	13000	13000	52

Continue

Cancel

ZCML Sales Data

Material and company data from initial screen

Enter the required data

- some data could be already filed in
» **verify them**

Material	CX6810-000	HEL-4973 KZ-LN-AK	RevLev	A
Material Type	ZHLB	AuthGrp	0014	AuthGrp ECOC 0390
Plant	0495	Sales Org.	0016	Distr channel 01 or <input checked="" type="checkbox"/> Add distr ch 01-03
Warehouse No.		Storage Type		Purchasing Org. TL01 MRP prof.

Sales Org 1

X-DChain status	E2	Valid from	24.10.2011	Deliver.Plant	0495
DChain-spec. status		Valid from		Sales Lead Time	

Tax data

CO	Country	Tax	Tax category	T	Tax classification
AT	Austria	MWST	Sales Tax	1	Full tax
BE	Belgium	MWST	Sales Tax	1	Full tax

Entry 1 of 26

Min.order qty	1	PC	Min. dely qty	1	PC
			Delivery unit	1	

Sales Org 2

Matl stats grp	1	Acct asgmt grp	01	Item cat.group	NORM	<input type="checkbox"/> TPS Source Ind
<input type="checkbox"/> Transfer Rate Cd		<input type="checkbox"/> Reseller Ind		<input type="checkbox"/> Returnable Ind		<input type="checkbox"/> No Header Discount

Sales: general / plant

Trans group	0001	Loading group	<input checked="" type="checkbox"/>	Matl Grp Pck	ALL	Serial Profile	
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Foreign trade

Comm./imp. code		Exp/imp group	01	Ctry of origin	DE
PRODCOM no.					

ZCML Purchasing & MRP Data

Enter the required data

- some data could be already filed in
 - » **verify them**
- Purchasing
 - No PUR View: by putting flag into it no purchasing views will be created
- MRP1
- MRP2
 - GIATP values 100
- MRP3

Purchasing			
<input type="checkbox"/> No PUR View			
Purch Group	Value key	GR proc time	<input type="checkbox"/> Auto PO <input type="checkbox"/> Source list
MRP 1			
MRP group	<input checked="" type="checkbox"/>	ABC Indicator	C
SpecProcurement		Prod.stor.loc.	
InhseProdTime	days	Pl. Deliv. Time	37 days
Backflush		Stock det. grp	
Procurement	F	Stor. loc. EP	<input checked="" type="checkbox"/>
SchedMargin key	<input checked="" type="checkbox"/>	Invy Reason Cd	
MRP 2			
MRP Type	<input checked="" type="checkbox"/>	Plng time fence	
Lot size	<input checked="" type="checkbox"/>	Rounding value	1
Min. Lot Size	1	Safety Stock	
GIATP Extra Window		GIATP Extra % of Safety Stock	
GIATP Call Window		GIATP Call % of Safety Stock	
Value Stream Mapping Name			
MRP Controller	<input checked="" type="checkbox"/>	Real Batch Indicator	<input type="checkbox"/>
MRP 3			
Period Ind.	P	Fl.Year Variant	Z1
Strategy group		Consumption mode	
Fwd cons.period		Mixed MRP	1
Splitting ind.	W	Bwd cons. per.	
Avail. check	<input checked="" type="checkbox"/>	Total RL time	26
MRP 4			
Indiv./coll.			

ZCML Work Scheduling & Quality Data

Enter the required data

- some data could be already filed in
 - » **verify them**
- Work scheduling for in-house produced parts
 - For F parts it is recommended to flag „No Work Schd View“
 - If work scheduling view needs to be created the field „Primary Mfg Bldg“ needs to be maintained
- Quality
 - If quality is required put flag



Work scheduling

☒ No Work Schd View

ProdScheduler ProdProfile

Underdely tol. Overdely tol.

Primary Mfg Plant Primary Mfg Bldg

Quality Management

☒ Create QM ☐ QM proc. active

QM Control Key

ZCML Accounting & Costing Data

Enter the required data

- some data could be already filed in
 - » **verify them**
- Accounting 1
- Costing 1
 - P-S matl status set to 03
 - after material costing has to be removed
 - Cstg Lot Size needs to be in synch with „Price Unit“
- Storage Location
 - Enter all storage locations which need to be created for material
 - At least storage locations entered on MRP1 have to be entered here
- Warehouse 1 if required

Accounting 1			
Price Unit	1.000	Standard price	0,01
		Currency	EUR
		<input checked="" type="checkbox"/> LIFO/FIFO	
Costing 1			
Origin group		P-S matl status	03
SpecProcType	T1	Profit Center	140
		Cstg Lot Size	1.000
Costing 2			
Planned price 1	0,00	Plnd pr. date 1	
Planned price 3	0,00	Plnd pr. date 3	
Storage			
StorageLocation		StorageLocation2	
StorageLocation4		StorageLocation5	
StorageLocation7		StorageLocation8	
		StorageLocation3	
		StorageLocation6	
		StorageLocation9	
Warehouse 1			
Stock removal		Stock placement	

ZCML – create material master

DEMO

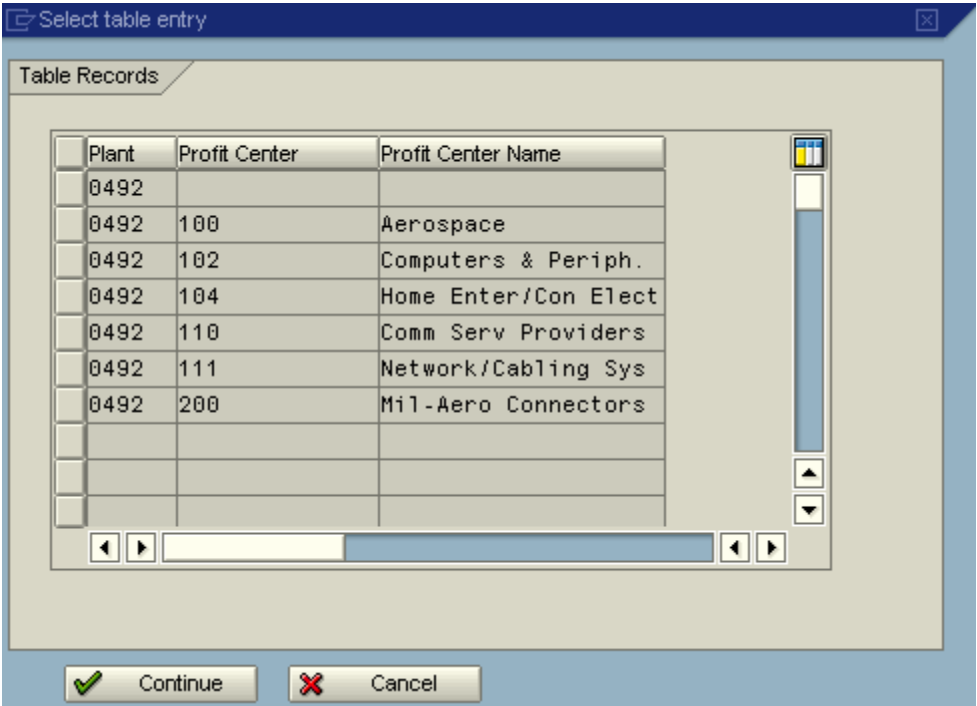


Defaulting ZCML values via ZDML

EVERY CONNECTION COUNTS

ZDML Overview & Purpose

Custom transaction for maintaining material master default values.
Default values proposed on the data entry screen of the ZCML transaction.
The keys to the default value records are Plant and Profit Center.



ZDML – Create Default Values

- Enter plant id and profit center id

Table Keys

Plant

0493

Profit Center

101

Copy From

Plant

Profit Center

- You can maintain default values for
 - Sales Org Views 1 & 2
 - Sales Plant Views
 - Foreign Trade

Plant

0493

Profit Center

101

Name

Motor Vehicles

Sales Org 1

DChain-status

Sales Lead Time

Deliver.Plant

0493

Min.order qty

Min. dely qty

Delivery unit

Sales Org 2

Matl stats grp

1

Acct asgmt grp

01

Item cat.group

NORM

☒ TPS Source Ind

☐ Transfer Rate Cd

☐ Reseller Ind

☐ Returnable Ind

☐ No Header Discount

Sales: general / plant

Trans group

0001

Loading group

0044

Matl Grp Pck

ALL

Serial Profile

Foreign trade

Comm./imp. code

Exp/imp group

01

Ctry of origin

PRODCOM no.

ZDML – Create Default Values

- You can maintain default values for
 - Purchasing View
 - Flag** would deactivate Purchasing View creation
 - MRP1
 - MRP2
 - MRP3
 - MRP4

Purchasing

☐ No PUR View

Purch Group
 Value key
 GR proc time 1
 ☒ Auto PO
 ☐ Source list

MRP 1

MRP group Z200
 ABC Indicator
 Procurement
 SpecProcurement
 Prod.stor.loc.
 Stor. loc. EP NR09
 InhseProdTime days
 Pl. Deliv. Time days
 SchedMargin key 010
 Backflush
 Stock det. grp
 Invy Reason Cd

MRP 2

MRP Type ZH
 Png time fence
 MRP Controller
 Lot size TB
 Rounding value
 Real Batch Indicator
 Min. Lot Size
 Safety Stock
 GIATP Extra Window
 GIATP Extra % of Safety Stock 100
 Assembly scrap
 GIATP Call Window
 GIATP Call % of Safety Stock 100
 ZOSA Forecast Inclusion
 Value Stream Mapping Name

MRP 3

Period Ind. P
 Fi.Year Variant Z1
 Splitting ind.
 Strategy group
 Consumption mode
 Bwd cons. per.
 Fwd cons.period
 Mixed MRP
 Avail. check ZD
 Total RL time

MRP 4

Indiv./coll.

ZDML – Create Default Values

- You can maintain default values for
 - Work Scheduling
 - Flag** would deactivate Work Scheduling View creation
 - Quality Management
 - Accounting 1
 - Costing 1 & 2
 - Storage
 - Warehouse 1

Work scheduling			
<input type="checkbox"/> No WS View			
ProdScheduler	ProdProfile	Underdely tol.	Overdely tol.
Primary Mfg Plant	Primary Mfg Bldg		
Quality Management			
<input type="checkbox"/> Create QM	<input type="checkbox"/> QM proc. active	QM Control Key	
Accounting 1			
Price Unit	Standard price	0, 01	Currency
			<input checked="" type="checkbox"/> LIFO/FIFO
Costing 1			
Origin group	P-S matl status	03	Profit Center
SpecProcType	T1	Cstg Lot Size	
Costing 2			
Planned price 1	Plnd pr. date 1		
Planned price 3	Plnd pr. date 3		
Storage			
StorageLocation	NR09	StorageLocation2	NR10
StorageLocation4		StorageLocation5	
StorageLocation7		StorageLocation8	
		StorageLocation3	NR08
		StorageLocation6	
		StorageLocation9	
Warehouse 1			
Stock removal		Stock placement	

ZDML default values vs TPEX data

During the creation of new material for interco relationship TPEX data are retrieved for certain fields like MOQ, lead times, costs, standard pack sizes, etc.

TPEX values will overwrite the default values defined by MRP profile.

When TPEX values are zero or do not exist ZDML values will be copied into ZCML screen.

ZDML – Create Default Values

DEMO



Defaulting ZCML MRP values via MRP profile

EVERY CONNECTION COUNTS

MRP profile overview

MRP profile provides the ability to default values for MRP views and purchasing group to be used during the initial material master setup.

MRP profile can be maintained via

- MMD1 – initial setup
- MMD2 – change existing
- MMD3 – review
- MMD6 – delete MRP profile

MRP profile is 4 characters and is global usable.

MRP profile overview

All SAP standard MRP fields can be defaulted via MRP profile by activation of the check box in column “Default value”.

Defined values will be defaulted into material master when MRP profile will be used during initial material master setup and can be changed afterwards.

It is NOT recommended to use check boxes in column "Fixed Val."

The values will be referenced into material master fields and cannot be changed on material master but only on MRP profile.

Checkboxes for MRP Profile

Selected fields will be copied to the profile

Write-protected in matl maintenance

Only default value in matl maintenance

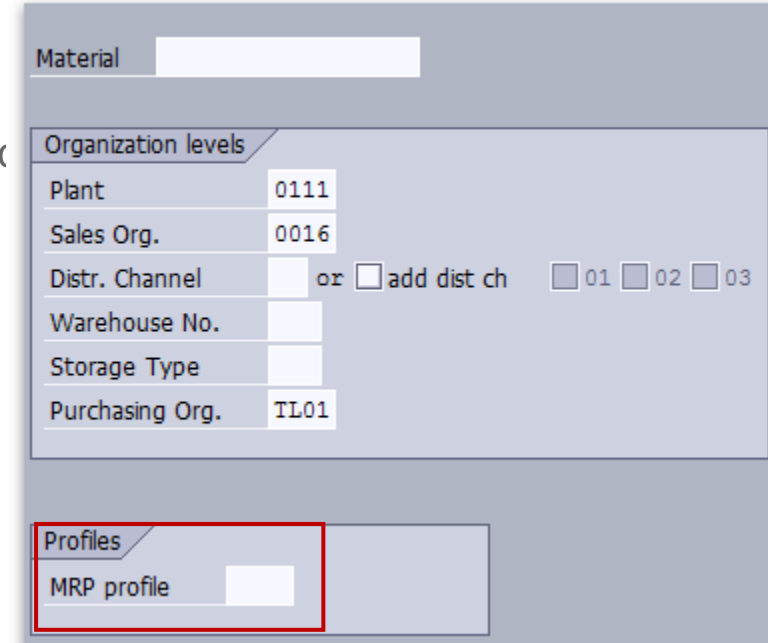
Field	Fixed val.	Default value
MRP Type	<input type="checkbox"/>	<input type="checkbox"/>
MRP Controller (Materials Plan	<input type="checkbox"/>	<input type="checkbox"/>
ABC Indicator	<input type="checkbox"/>	<input type="checkbox"/>
Planned Delivery Time in Days	<input type="checkbox"/>	<input type="checkbox"/>
In-house production time	<input type="checkbox"/>	<input type="checkbox"/>
Scheduling Margin Key for Floa	<input type="checkbox"/>	<input type="checkbox"/>
Dependent requirements ind. fo	<input type="checkbox"/>	<input type="checkbox"/>
Indicator for Requirements Gro	<input type="checkbox"/>	<input type="checkbox"/>
Safety Stock	<input type="checkbox"/>	<input type="checkbox"/>
Reorder Point	<input type="checkbox"/>	<input type="checkbox"/>
Lot size (materials planning)	<input type="checkbox"/>	<input type="checkbox"/>

Use MRP profile during ZCML initial material creation

If you create new material via ZCML the MPR profile can be entered into the field “MRP profile”.

Using MRP profile to default values during ZCML material master creation following logic applies:

- When TPEX value is greater than zero, copy the TPEX value
- When TPEX is zero use MRP profile value.
- When MRP profile value is blank use ZDML value.



The screenshot shows the SAP Material Master creation interface. The 'Material' field is at the top. Below it is the 'Organization levels' section with the following fields:

Plant	0111
Sales Org.	0016
Distr. Channel	<input type="checkbox"/> or <input type="checkbox"/> add dist ch <input type="checkbox"/> 01 <input type="checkbox"/> 02 <input type="checkbox"/> 03
Warehouse No.	<input type="text"/>
Storage Type	<input type="text"/>
Purchasing Org.	TL01

Below the 'Organization levels' section is the 'Profiles' section, which contains the 'MRP profile' field. This field is highlighted with a red border in the screenshot.

Copy existing values from another material

EVERY CONNECTION COUNTS

Copy values from an existing materials

Creating a new material the values can be copied from another existing material.

Data to be copied from can be specified:

- From the same company org level, plant, sales org.
- From different company org level, plant, sales org.

Material
928998-1

Copy from...

Material5-928999-1

Organization levels

Plant1071
Sales Org.0016
Distr. Channel
or
☒ add dist ch
☒ 01
☒ 02
☒ 03
Warehouse No.
Storage Type
Purchasing Org.TL01

Copy from...

Plant0115
Sales Org.0016
Distr. Channel03
Warehouse No.
Storage Type

Copy values from an existing materials

By copying values from an existing materials keep in mind:

- Data are copied from the source plant, sales org.
- Data might not be appropriate for the plant to be copied to.
- You have to review the values on ZCML screen and updated accordingly.
- Quite risky that materials will be setup with wrong master data.

Troubleshooting

Contacts:

- Kris Dekiere (kris.dekiere@te.com, phone ++32475350066)
- Walter Fix (wfix@te.com, phone +491735809210)
- Your local key user or business unit [key user](#)

If you see scope for improvement in this document please complete a [request](#) to submit to EMEA process team.

Glossary

MRP	Material Requirements Planning
MOQ	Minimum Order Quantity
TPEX	Transfer Pricing Excellence (replacement of TPS Tyco Product Source)



System Configuration

None

Change index

23 Aug 2021: WF new document template applied.

29 Sept 2020: WF new ppt template applied; p.5 required material master security roles.

23 may 2016: WF p.20 ZDML values vs TPEX, p.22 – 25 Defaulting ZCML MRP values via MRP profile, p.28 – 29 Copy existing values from another material.

5 apr 2016: WF new training document template, p.5 ZCML Overview & Purpose, p.13 ZDML Overview & Purpose, p.7 TPS replaced by TPEX

12 nov 2012: Kde Initial release