

Add-On Solution Package

„Workflow Utilites - Concepts vN-n“

This Add-On Package adds functionality to complement the standard workflows features. Like

- Toolbar button of Workflow History Form to view the Workflow Process directly from the “SignOffs” tab
- Logic to change WF Activities’ permissions to allow “adhoc” Workflow Assignments.
→ Can be triggered from Life Cycle transitions or when Workflow Activities get activated. An example is added to the Express DCO’s life cycle.
- Add a “single Review Express DCO Workflow” that can be used instead of the standard workflow.
- Add a “Team Review Express DCO Workflow” that can be used instead of the standard workflow.
- Logic to set activities to “automated” ,if no assignments configured. This way you can set up many sequential activities with no assignments and use “ad-hoc” assignment on the ones you want to activate after the workflow process was started.
- Sample code to show how to save data from Workflow activities to the item connected to the workflow process.
- Logic to „clone“ an activity when you loop to it again so you can still add different „ad-hoc“ assignments. The „Team Review Express DCO“ workflow has an example how to use this logic.

Installation

- Use the Aras Packaging Utilities Import Tool to import the package „Workflow Utilites - Concepts –vN-n“
- There are 3 Import steps to do separately
 - Import1 → log on as „root“ and use „merge“ option
 - Import2 → log on as „admin“ and use „merge“ option
 - (optional) import3 - Set TeamReview WF on DCO → log on as „admin“ and use „merge“ option
- Also, read the rest of this documentation to learn how it works.

View Workflow from SignOff Tab

The image displays two overlapping web browser windows from the ECO system. The background window is titled 'ECO - ECO-00001007 (read only) - Windows Internet Explorer'. It shows a form for 'ECO' with fields for 'Number' (ECO-00001007), 'Title' (aaa), 'Change Reason' (aaa), 'Change Coordinator' (Innovator Admin), 'Release Date', 'Team' (Product Team), and 'Effective'. Below the form is a 'Plan Review' section with a 'Priority' dropdown (1-High, 2-Normal, 3-Low) and a 'Sign Off' button. A red dashed arrow points from the 'Sign Off' button to the 'Workflow Process' window.

The foreground window is titled 'Workflow Process - ECO-00001007 - Windows Internet Explorer'. It shows a 'Workflow Process' window with a 'Name' field (ECO-00001007), 'Active Date' (10/20/2012), 'Closed Date', 'Process Owner' (Innovator Admin), and 'Started By' (Innovator Admin). Below this is an 'Activity Summary' table and an 'Assignments' table.

Activity Summary Table:

Name	Managed By	Role
Draft Changes	Innovator Admin	

Assignments Table:

Name	Required	For All	Voting Weight	Exclude To
Owner	<input type="checkbox"/>	<input type="checkbox"/>	100	

Below the tables is a 'Message' field with the text 'Update affected parts'. At the bottom is a workflow diagram showing the process flow from 'Begin' to 'End' through various steps like 'Submit ECO', 'Plan Review', 'Approve Plan', 'Submit to Review', 'Change Review', and 'Close Change'.

Modified Layout:
Assignments on top of Workflow graph

New toolbar icon
To open assigned Workflow Process

Set Permissions to allow adhoc Assignments on Workflow Process

New Method: „CopyChangeOwnerToWorkflow“

The Owner (i.e. Change Coordinator) of the workflow controlled item will be set to be the owner of all workflow activities. The Logic can be triggered (added) on Workflow controlled item or workflow path/activity.

ECO - ECO-00001007 (read only) - Windows Internet Explorer

File Edit Views Search Actions Reports Tools Help

Number: ECO-00001007

Title: aaa

Change Reason: aaa

Change Coordinator: Innovator Admin

Release Date:

Effective Date:

Team: Product Team

Priority:

- ☐ 1 - High
- ☐ 2 - Normal
- ☐ 3 - Low

Impact Matrix Attachments Sign Offs

Workflow History Report

Item: ECO-00001007

Express ECO Workflow

Started By: Innovator Admin

Started On: 10/12/2011

Activity	State	Assigned To	Completed By	How Voted
Submit ECO	Closed	Innovator Admin	Innovator Admin	Submit to Planning
Planning	Closed	Innovator Admin	Innovator Admin	Submit to Plan Review
Plan Review	Closed	Innovator Admin	Innovator Admin	Approve Plan
Plan Review 2	Active	Innovator Admin		VOTE NOW

Workflow Process - ECO-00001007 - Windows Internet Explorer

File Edit Views Search Actions Reports Tools Help

Name: ECO-00001007

Active Date: 10/12/2011

Label: ECO

Process Owner: Innovator Admin

Started By: Innovator Admin

Closed Date:

View Signoffs Cancel Workflow

Workflow Process

Activity Summary

Name	Managed By	Role	Status	Escalate To	Duration
Draft Change	Innovator Admin		Pending		

Assignments

Name	Required	For All	Voting Weight	Escalate To
Owner	<input type="checkbox"/>	<input type="checkbox"/>	100	

Message

Update affected parts

Workflow History Report

Start

Submit ECO

Cancel Change

Submit to Planning

Plan Review

Start work

Draft Change

Close Change

Close Change

Approve Plan

Approve Plan

Submit to Review

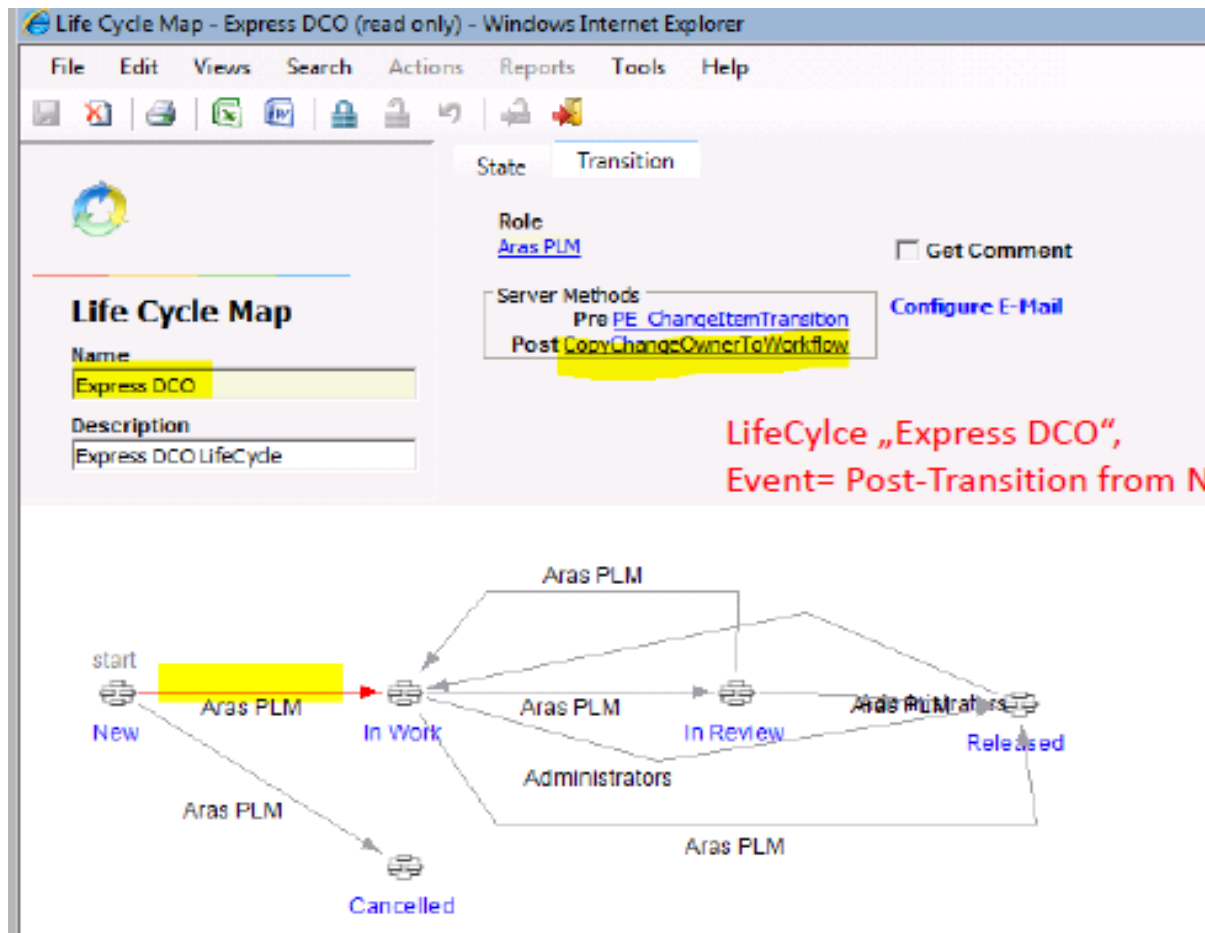
Change Review

Plan Review 2 skip

Submit Review

Ready

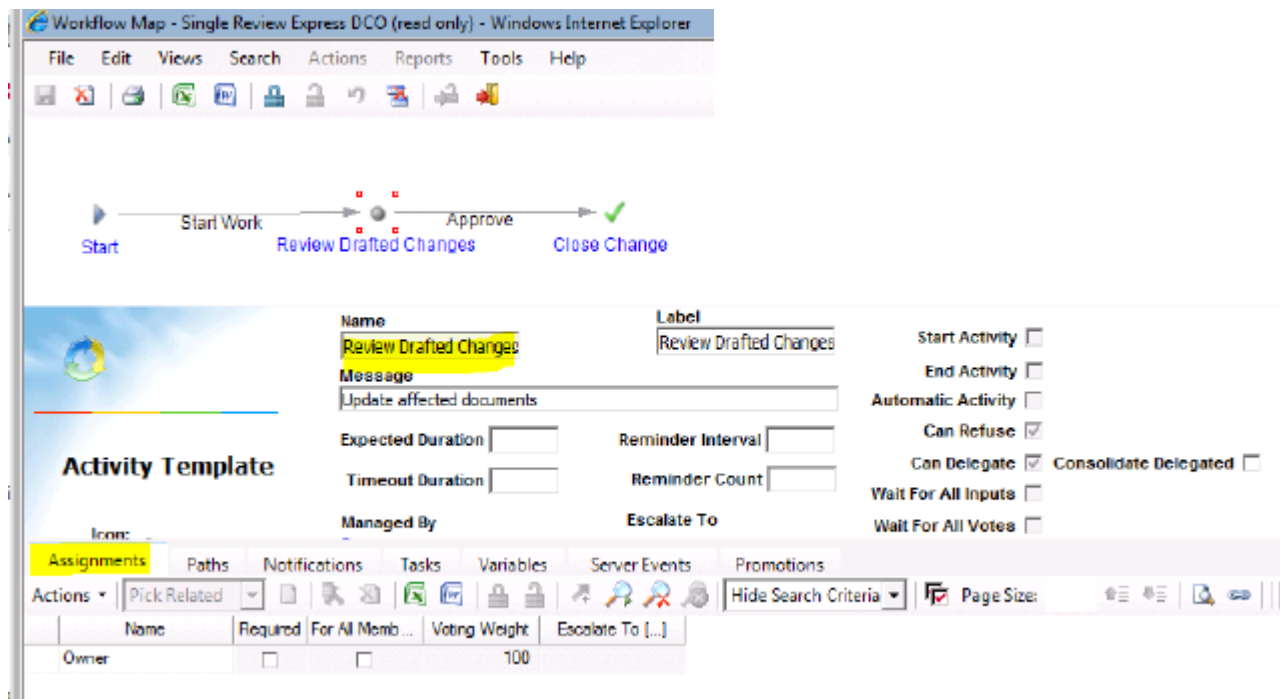
Example to trigger logic for Adhoc Workflow Assignments



Single Review Workflow „Single Review Express DCO“

You can use this workflow instead of standard „Express DCO“ on Documents

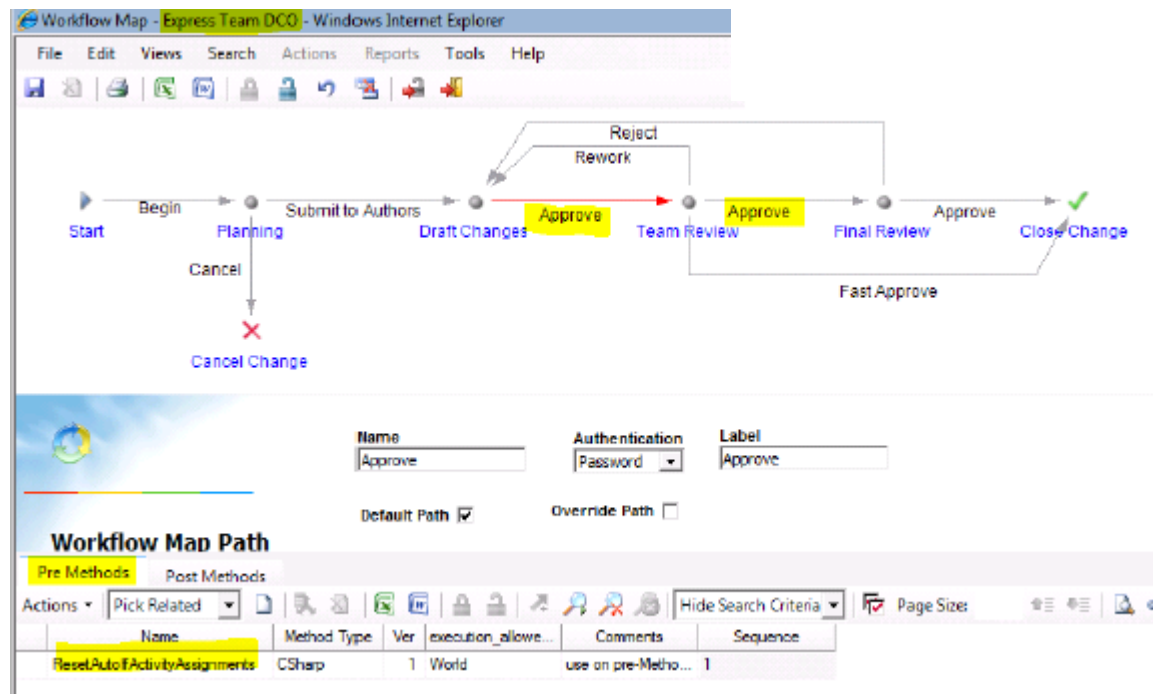
In conjunction with adhoc workflow assignments the change coordinator can add an remove reviewers to/from the single Review Activity



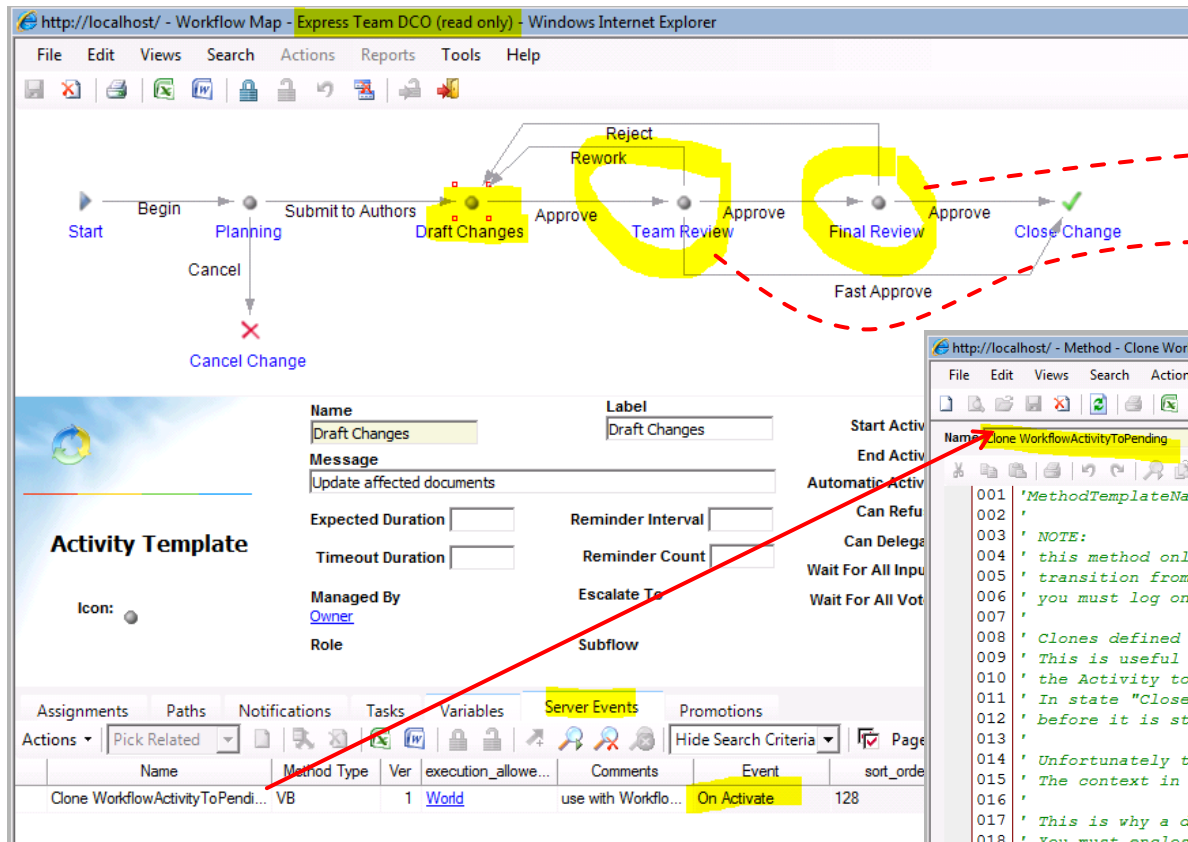
Sequential 2 Step (Team) Review Workflow „Express Team DCO“

You can use this workflow instead of standard „Express DCO“ on Documents

In conjunction with logic for automated review activities the assignments of the review steps can be empty and then the DCO will close right after „Draft Changes“



Example to trigger logic to “clone” defined other Activities from an Activity on the Workflow Map



Method: Clone WorkflowActivityToPending (read only) - Windows Internet Explorer

Comment: use with Workflow activity "onActivate" event

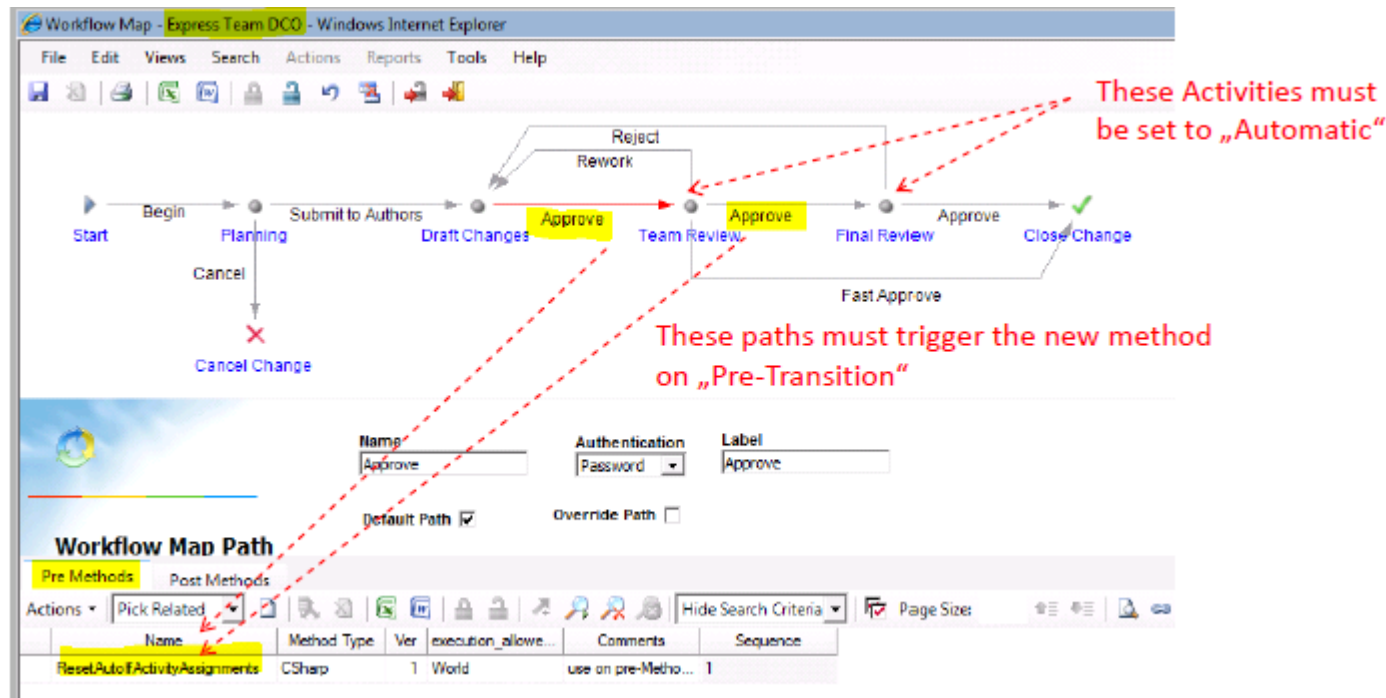
```
001 'MethodTemplateName=VBMain;
002 '
003 ' NOTE:
004 ' this method only works if the Life Cycle Map "Workflow Process" has a
005 ' transition from "Closed" to "Pending" for role "Aras PLM".
006 ' you must log on as "root" to add this transition
007 '
008 ' Clones defined activities to get "Pending" instance in the workflow process.
009 ' This is useful when using dynamic activity assignments. When looping back from a
010 ' the Activity to loop back from must be updatable by the WF owner to set assignme
011 ' In state "Closed" updates are Not permitted. This is why this Activity should be
012 ' before it is started again
013 '
014 ' Unfortunately this does not work on "post" path event of the workflow. Which you
015 ' The context in path events does not give information from which activity the pa
016 '
017 ' This is why a defined list of Activity names, this logic will be applied to, mus
018 ' You must enclose these names in single quotes ' and separate them by comma , !!
019 '
020 Dim activitiesToPromoteBackToPending As String = "'Team Review','Final Review'"
021
022 Dim inn As Innovator = Me.getInnovator()
```


Automate Sequential Review Activities on a Workflow

Method Name: „ResetAutofActivityAssignments“

Logic must be triggered (added) to **pre-Path Method on Workflow Map**

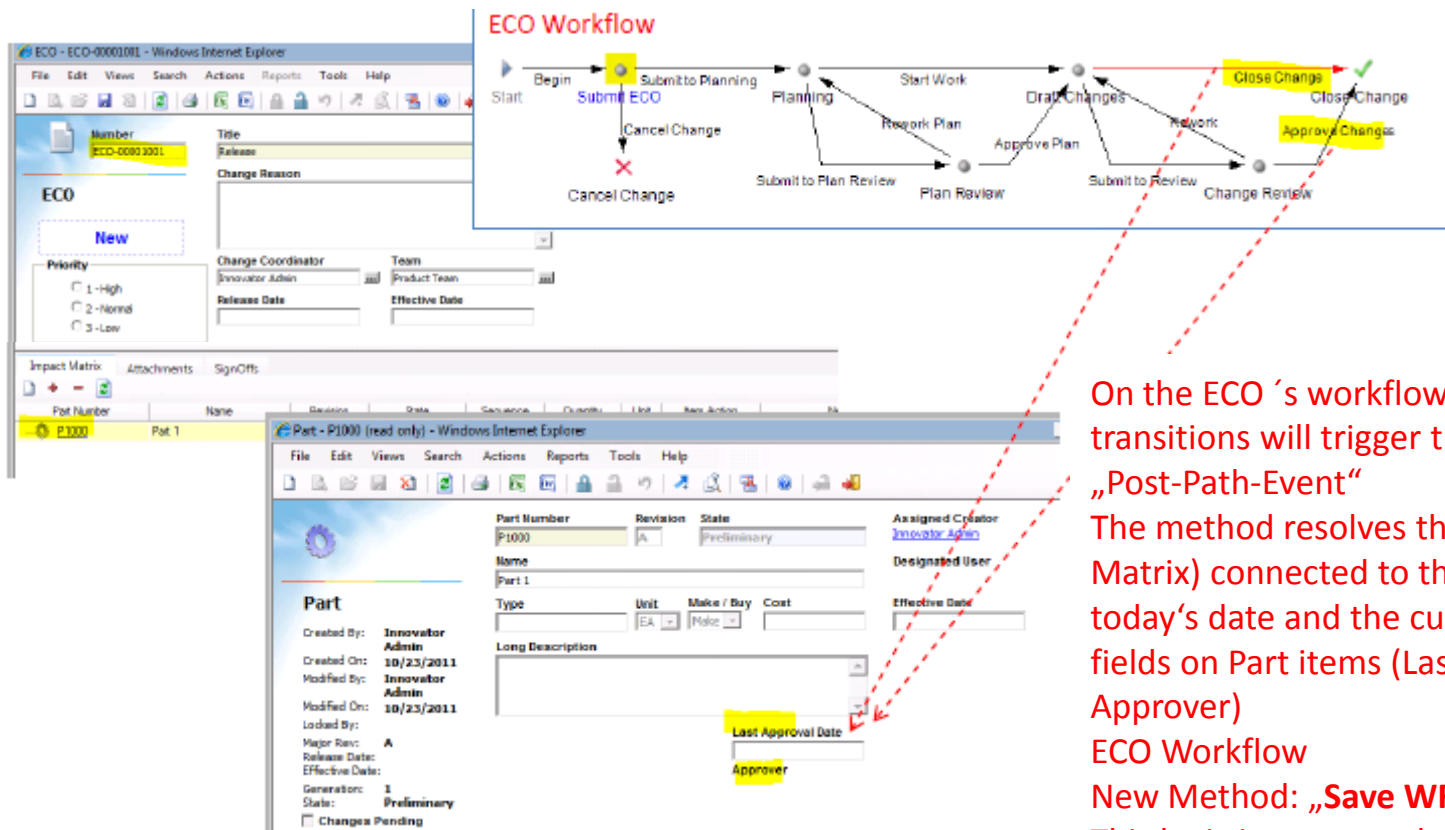
Example: Workflow Map „Express Team DCO“



Save Data from Workflow to Affected Items

New Method: „Save WFdata to AffectedItems “

This logic is an example how data triggered from the workflow context can be written to affected items of an ECO or DCO.



Save Data from Workflow to Affected Items

Configuration Details – Workflow Example: „Express ECO“

