SAP MM: Purchase Requisition with Classification and Workflow Approval

Applies to:

SAP 4.7 and above, SAP-MM-PUR-REL.

For more information, visit the [Enterprise Resource Planning homepage](#).

Summary

The Document details the customizing settings required for purchase requisition release strategy set up and the workflow settings necessary to automate the approval process. The document also illustrates a one step header level release approval process with classification system.

Author: Harish Kumar Parthasarathy

Company: TCS

Created on: 09 December 2009.

Author Bio

Harish Kumar Parthasarathy is working as an SAP MM consultant. He's an expert in SAP MM / SRM and WM Modules.

Table of Contents

Introduction

Purchase Requisition Approval Can be through
    ⇨   With Classification.

With this procedure, requisitions can be released both at **item level** (i.e. item-by-item) and **in total**. The latter approach is also termed "overall release
    ⇨   Without Classification.

With this procedure, requisitions can only be released at **item level**.
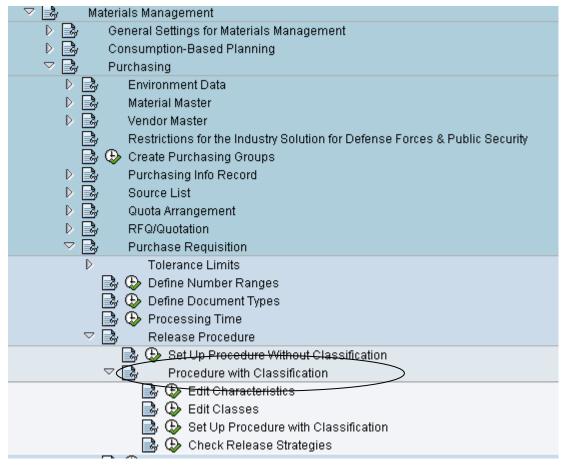
WITH CLASSIFICATION.

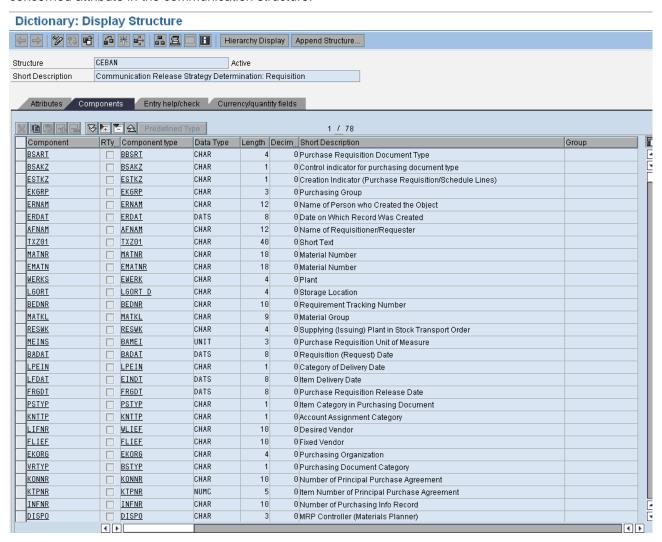

Fig-1

Communication Structure

Purchase Requisition Communication Structure.

The Structure CEBAN carries data details from the PR being created and is used for determining the Release Strategy.

The Classification function of the SAP is being used for this process.

The Determinants of the Release strategy are created as the Characteristics and they are assigned to the Class.

Eg : Plant and Order type are being used to determine the release strategy and they refer the attributes of concerned attribute in the communication structure.
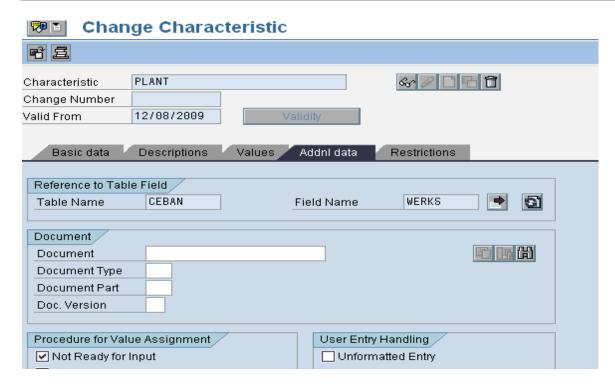
Dictionary: Display Structure

| Structure | CEBAN | Active |
| Short Description | Communication Release Strategy Determination: Requisition |

Attributes | Components | Entry help/check | Currency/quantity fields

1 / 78

Component	RTy	Component type	Data Type	Length	Decim	Short Description	Group
BSART	☐	BBSRT	CHAR	4	0	Purchase Requisition Document Type	
BSAKZ	☐	BSAKZ	CHAR	1	0	Control indicator for purchasing document type	
ESTKZ	☐	ESTKZ	CHAR	1	0	Creation Indicator (Purchase Requisition/Schedule Lines)	
EKGRP	☐	EKGRP	CHAR	3	0	Purchasing Group	
ERNAM	☐	ERNAM	CHAR	12	0	Name of Person who Created the Object	
ERDAT	☐	ERDAT	DATS	8	0	Date on Which Record Was Created	
AFNAM	☐	AFNAM	CHAR	12	0	Name of Requisitioner/Requester	
TXZ01	☐	TXZ01	CHAR	40	0	Short Text	
MATNR	☐	MATNR	CHAR	18	0	Material Number	
EMATN	☐	EMATNR	CHAR	18	0	Material Number	
WERKS	☐	EWERK	CHAR	4	0	Plant	
LGORT	☐	LGORT_D	CHAR	4	0	Storage Location	
BEDNR	☐	BEDNR	CHAR	10	0	Requirement Tracking Number	
MATKL	☐	MATKL	CHAR	9	0	Material Group	
RESWK	☐	RESWK	CHAR	4	0	Supplying (Issuing) Plant in Stock Transport Order	
MEINS	☐	BAMEI	UNIT	3	0	Purchase Requisition Unit of Measure	
BADAT	☐	BADAT	DATS	8	0	Requisition (Request) Date	
LPEIN	☐	LPEIN	CHAR	1	0	Category of Delivery Date	
LFDAT	☐	EINDT	DATS	8	0	Item Delivery Date	
FRGDT	☐	FRGDT	DATS	8	0	Purchase Requisition Release Date	
PSTYP	☐	PSTYP	CHAR	1	0	Item Category in Purchasing Document	
KNTTP	☐	KNTTP	CHAR	1	0	Account Assignment Category	
LIFNR	☐	WLIEF	CHAR	10	0	Desired Vendor	
FLIEF	☐	FLIEF	CHAR	10	0	Fixed Vendor	
EKORG	☐	EKORG	CHAR	4	0	Purchasing Organization	
VRTYP	☐	BSTYP	CHAR	1	0	Purchasing Document Category	
KONNR	☐	KONNR	CHAR	10	0	Number of Principal Purchase Agreement	
KTPNR	☐	KTPNR	NUMC	5	0	Item Number of Principal Purchase Agreement	
INFNR	☐	INFNR	CHAR	10	0	Number of Purchasing Info Record	
DISPO	☐	DISPO	CHAR	3	0	MRP Controller (Materials Planner)	

Define Characteristic

Step 1 .

Create Characteristics. Refer fig 1. T-Code : CT04.

Change Characteristic

Characteristic	PLANT
Change Number	
Valid From	12/08/2009

Basic data | **Descriptions** | **Values** | **Addnl data** | **Restrictions**

Reference to Table Field

Table Name	CEBAN	Field Name	WERKS

Document

Document	
Document Type	
Document Part	
Doc. Version	

Procedure for Value Assignment
☑ Not Ready for Input

User Entry Handling
☐ Unformatted Entry

In the same way, Characteristic for the attribute PR document type is set.
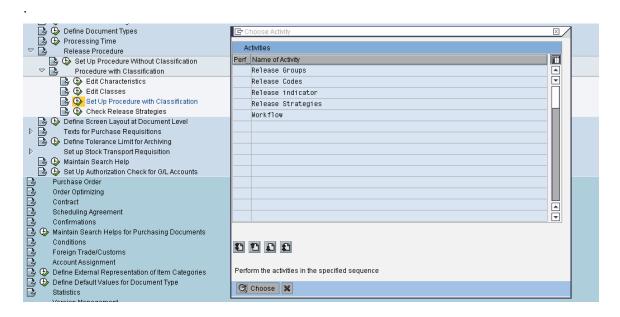
Define Class

Step 2. Create Class, T-Code – CL02 or the img. The Class created should be of Class type 032.

Change Class:

Class	FRG_EBAN_HEADER
Class type	032 Release strategy
Change Number	
Valid from	12/08/2009

Basic Data | **Keywords** | **Char.** | **Texts**

Basic data

Description	PR release Startegy Header
Status	1 Released
Class group	
Organizational area	
Valid From	12/02/2009

☐ Local class

Valid to 12/31/9999

Same classification
◉ Do not check
○ Warning message
○ Check with error

Authorizations

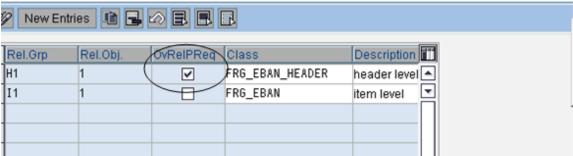|	
Class maintenance	
Classification	
Find object	

Define Release Strategy

Step 3. Set up Procedure with classification.

.

Set Release Groups.

Release Group H1 is assigned to the Class we created above and PR release at header level is activated.
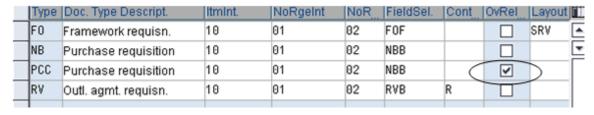

PR with Classification can be released at header level or item level

For Header level release the indicator should be set as above.

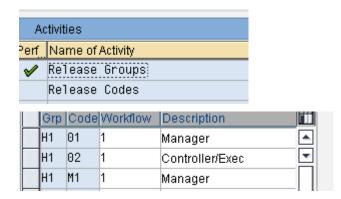The indicator should also be set for the PR document type.

Set Release Codes.

Here you create the **release codes** that you need for your **release strategy** and assign the codes to your release group. If a release code is to be used in workflow, indicate this accordingly in the **Workflow** field.

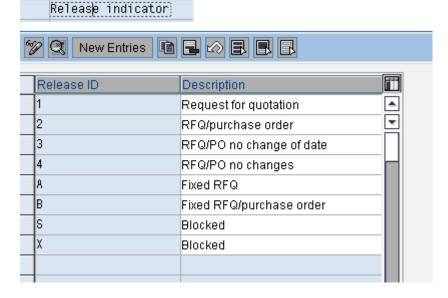|	Activities			
Perf	Name of Activity			
✔	Release Groups			
	Release Codes			

	Grp	Code	Workflow	Description	
	H1	01	1	Manager	▲
	H1	02	1	Controller/Exec	▼
	H1	M1	1	Manager	

Set Release Indicators.

SAP standard release indicators can be used.

	Activities	
Perf	Name of Activity	
✔	Release Groups	
✔	Release Codes	
	Release indicator	

New Entries

	Release ID	Description	
	1	Request for quotation	▲
	2	RFQ/purchase order	▼
	3	RFQ/PO no change of date	
	4	RFQ/PO no changes	
	A	Fixed RFQ	
	B	Fixed RFQ/purchase order	
	S	Blocked	
	X	Blocked	

Set Release Strategy.

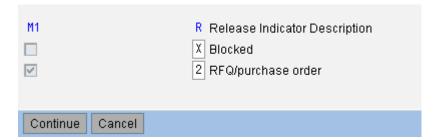|	Activities	
Perf	Name of Activity	
✔	Release Groups	
✔	Release Codes	
✔	Release indicator	
	Release Strategies	
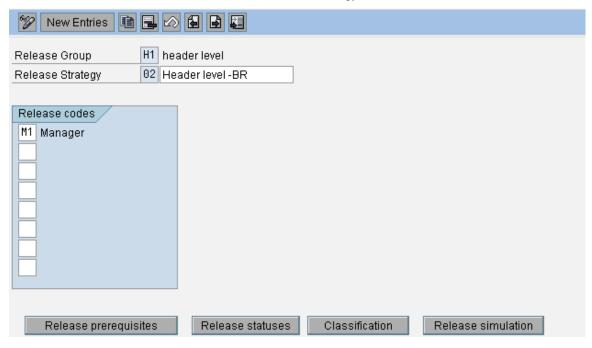
Select New Entries.

Set the Release codes which would be used in the strategy.

Release prerequisites can be used to determine if the release needs to happen in sequence.

Release status shows the Status the PR undergoes on release by each release codes.

Classification:

The data set in the classification is the data which determines the release strategy.
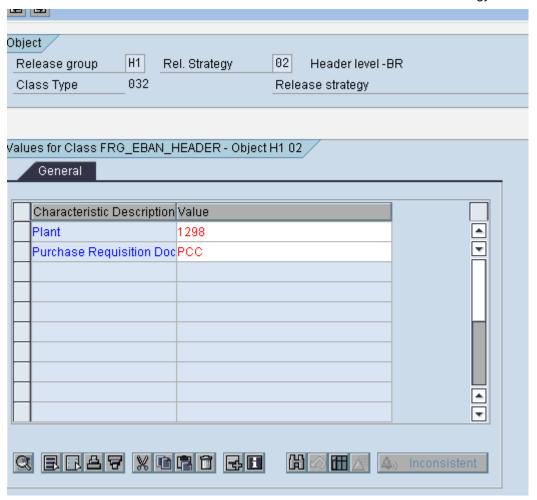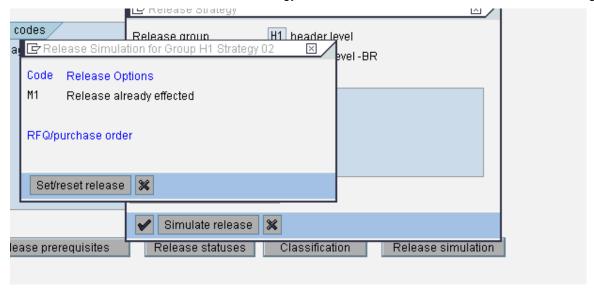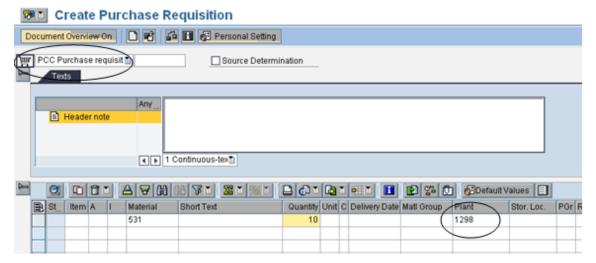

Fig 2.

Release Simulation: Save the Release strategy and use this function to check the Release strategy.
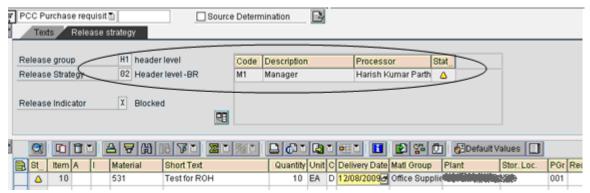
Purchase Request Creation and Determination of Release Strategy

Document type "PCC" and the Plant code "1298" determines the release strategy 02

which has characteristics value PCC and 1298. Refer Fig 2. above.

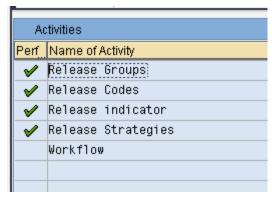Release strategy determined is displayed in the top.

Workflow

If the Workflow settings are made as below. System would route the work item automatically into the SAP inbox of the approver. Otherwise in order to release the PR.

The approver has to manually pull the PR through T-Code ME55 for release or T-code ME54N.

Workflow settings:
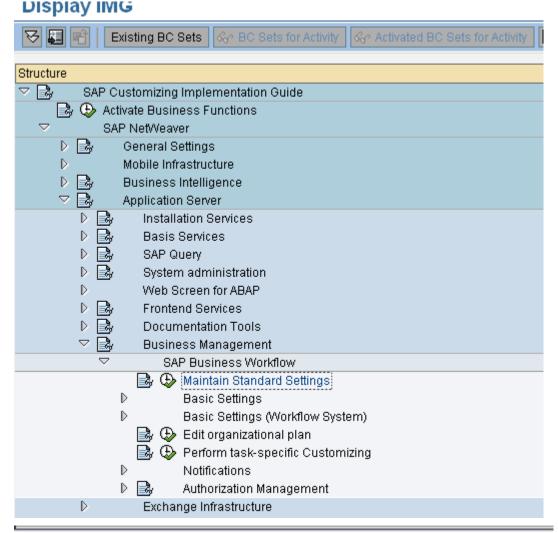
The Release code is assigned to Processor ID. In case of overall release no plant code is assigned with the release group/code and Processor ID.

Activities	
Perf	Name of Activity
✔	Release Groups
✔	Release Codes
✔	Release indicator
✔	Release Strategies
	Workflow

	Grp	Code	Description	Plnt	OT	Agent ID	
	H1	01	Manager		US	YPCC	▲
	H1	02	Controller/Exec		US	YPCC	▼
	H1	M1	Manager		US	HPARTHASARAT	
	I1	01	Manager	0005	US	YPCC	
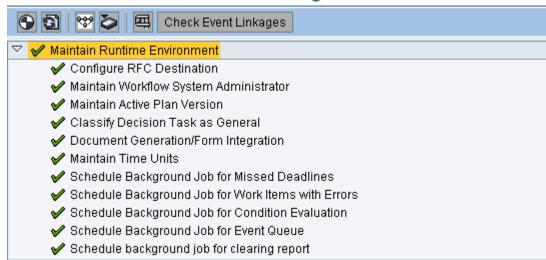
Check Whether Automatic workflow settings are set.

T-Code: SWU3 or img.

Display IMG

| | | | Existing BC Sets | BC Sets for Activity | Activated BC Sets for Activity | |

Structure

- SAP Customizing Implementation Guide
  - Activate Business Functions
    - SAP NetWeaver
      - General Settings
      - Mobile Infrastructure
      - Business Intelligence
      - Application Server
        - Installation Services
        - Basis Services
        - SAP Query
        - System administration
        - Web Screen for ABAP
        - Frontend Services
        - Documentation Tools
        - Business Management
          - SAP Business Workflow
            - Maintain Standard Settings
            - Basic Settings
            - Basic Settings (Workflow System)
            - Edit organizational plan
            - Perform task-specific Customizing
            - Notifications
            - Authorization Management
      - Exchange Infrastructure

Automatic Workflow Customizing

| | | | | | Check Event Linkages |

- ✔ Maintain Runtime Environment
  - ✔ Configure RFC Destination
  - ✔ Maintain Workflow System Administrator
  - ✔ Maintain Active Plan Version
  - ✔ Classify Decision Task as General
  - ✔ Document Generation/Form Integration
  - ✔ Maintain Time Units
  - ✔ Schedule Background Job for Missed Deadlines
  - ✔ Schedule Background Job for Work Items with Errors
  - ✔ Schedule Background Job for Condition Evaluation
  - ✔ Schedule Background Job for Event Queue
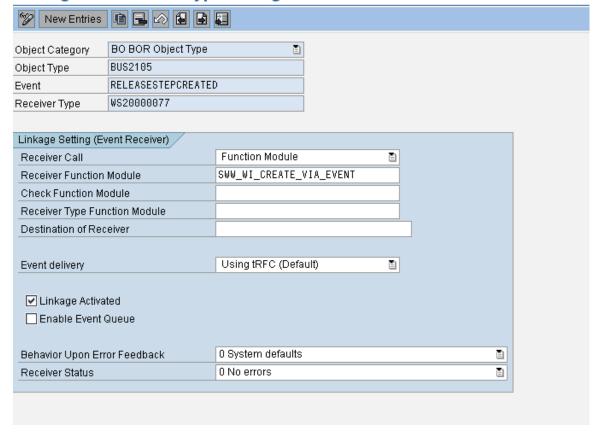 - ✔ Schedule background job for clearing report

Technical Realization

Object technology is used to create the interface between the SAP functionality and the Workflow system.

Since we use Overall Release we need to activate the object BUS2105.
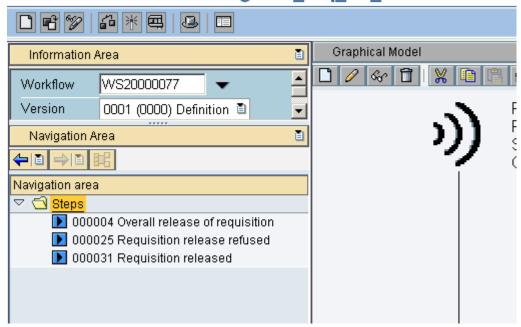

T-Code: SWETYPV

Change View "Event Type Linkages": Details of Selected Set

New Entries

Object Category	BO BOR Object Type
Object Type	BUS2105
Event	RELEASESTEPCREATED
Receiver Type	WS20000077

Linkage Setting (Event Receiver)

Receiver Call	Function Module
Receiver Function Module	SWW_WI_CREATE_VIA_EVENT
Check Function Module	
Receiver Type Function Module	
Destination of Receiver	
Event delivery	Using tRFC (Default)

☑ Linkage Activated
☐ Enable Event Queue

Behavior Upon Error Feedback	0 System defaults
Receiver Status	0 No errors

In order to know the task associated with the Workflow.

Go to T-code – SWDD and enter the workflow number
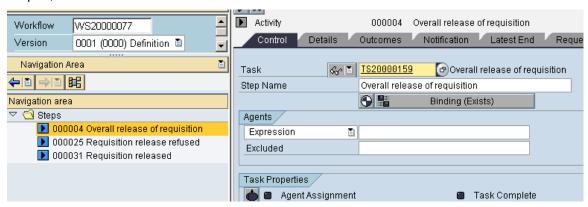
Workflow Builder - Change 'wf_req_rel_c'

Information Area	
Workflow	WS20000077
Version	0001 (0000) Definition

Navigation Area

Navigation area
▽ 📁 Steps
   ▶ 000004 Overall release of requisition
   ▶ 000025 Requisition release refused
   ▶ 000031 Requisition released

Graphical Model
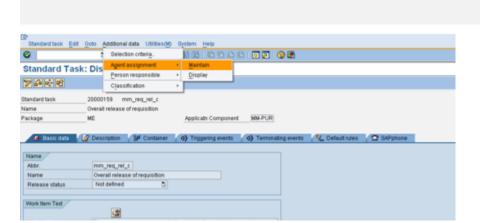
Step 4 , 25 and 31 are called as tasks.

For Overall release, the task TS20000159 should be assigned with agents who could execute the step. So it should not be set as general task.
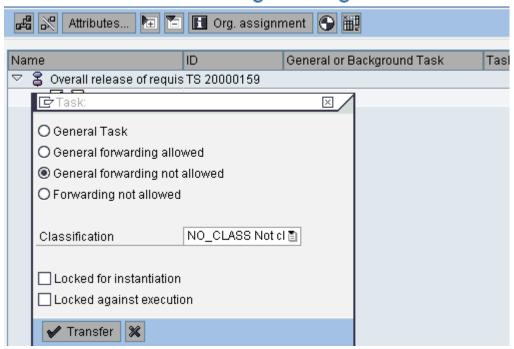
T-Code: PFTC.

Set the task as not a general task.
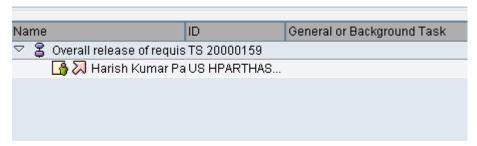
Choose the agent type.

Name	ID	General or Background Task
▽ 🎴 Overall release of requis	TS 20000159	
📇 📨 Harish Kumar Pa	US HPARTHAS...	
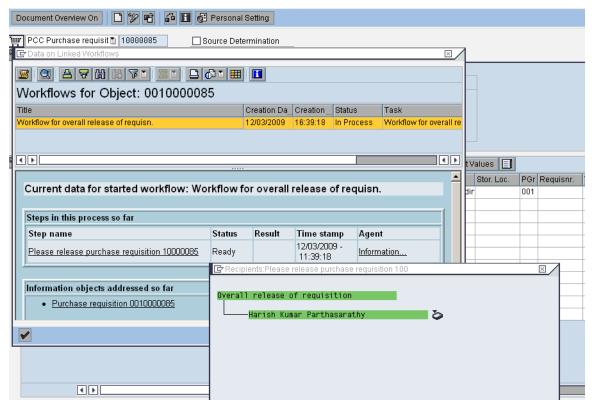
Generate and exit.
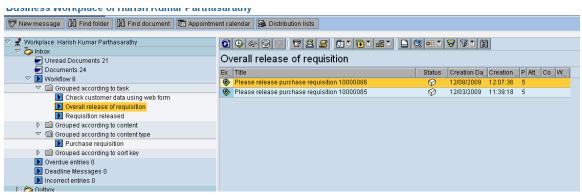
Once the Workflow activation is done.

The PR created would indicate the workflow.

Document Overview On	🗋 📝 🖫	🖨 🛈 🖳 Personal Setting

🛒 PCC Purchase requisit☰ 10000085   ☐ Source Determination

Data on Linked Workflows ⊠

Workflows for Object: 0010000085

Title	Creation Da	Creation	Status	Task
Workflow for overall release of requisn.	12/03/2009	16:39:18	In Process	Workflow for overall re

t Values 🗉

Stor. Loc.   PGr   Requisnr.
dir   001

Current data for started workflow: Workflow for overall release of requisn.

Steps in this process so far

Step name	Status	Result	Time stamp	Agent
Please release purchase requisition 10000085	Ready		12/03/2009 - 11:39:18	Information...

Recipients:Please release purchase requisition 100 ⊠

Overall release of requisition
    Harish Kumar Parthasarathy   🖧

Information objects addressed so far

- Purchase requisition 0010000085

✔

The PR created so, would be accessed from approver inbox and released from there.

T-code : SBWP

Business Workplace of Harish Kumar Parthasarathy

📝 New message	📁 Find folder	📁 Find document	📅 Appointment calendar	📖 Distribution lists

Overall release of requisition

Ex	Title	Status	Creation Da	Creation	P	Att	Co	W
🏵	Please release purchase requisition 10000086	📦	12/08/2009	12:07:36	5			
🏵	Please release purchase requisition 10000085	📦	12/03/2009	11:39:18	5			

- ▽ 🕴 Workplace: Harish Kumar Parthasarathy
  - ▽ 📂 Inbox
    - 📧 Unread Documents 21
    - 📧 Documents 24
    - ▽ ▶️ Workflow 8
      - ▽ 📁 Grouped according to task
        - ▶️ Check customer data using web form
        - ▶️ Overall release of requisition
        - ▶️ Requisition released
      - ▷ 📁 Grouped according to content
      - ▽ 📁 Grouped according to content type
        - ▶️ Purchase requisition
      - ▷ 📁 Grouped according to sort key
    - ▶️ Overdue entries 0
    - ▶️ Deadline Messages 0
    - ▶️ Incorrect entries 0
  - ▷ 📂 Outbox

On executing

The PR is released or refused or amended based on the decision.

Auth Object : M_EINK_FRG – The object should have the relevant Release code assigned for the approver.

Disclaimer and Liability Notice

This document may discuss sample coding or other information that does not include SAP official interfaces and therefore is not supported by SAP. Changes made based on this information are not supported and can be overwritten during an upgrade.

SAP will not be held liable for any damages caused by using or misusing the information, code or methods suggested in this document, and anyone using these methods does so at his/her own risk.

SAP offers no guarantees and assumes no responsibility or liability of any type with respect to the content of this technical article or code sample, including any liability resulting from incompatibility between the content within this document and the materials and services offered by SAP. You agree that you will not hold, or seek to hold, SAP responsible or liable with respect to the content of this document.