# PRINT:EWM:Graphical Work Management Guide



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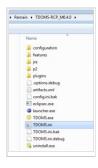
# **Getting started**

### **Startup Preferences**

This section describes the startup preferences that can be passed to the TD/OMS GUI. It controls various aspects of the GUI. The preferences are stored in a "ini" file. The file is called TDOMS.ini in case of the standalone RCP or it is called eclipse ini in case you have installed the plug-ins in a normal Eclipse installation or Rational installation. Before you start, make a backup of the original file.

The file looks something like this:

-startup
olugins/org.eclipse.equinox.launcher_1.1.1.R36x_v20101122_1400.jar
launcher.library
plugins/org.eclipse.equinox.launcher.win32.win32.x86_1.1.2.R36x_v20101222
console
-consoleLog
-debug
-vm .\jre\bin\java.exe
-vmargs
-Xme128m
-Xmx512m
-XX:MaxPermSize=256m
Domx.trace.level=max



## How to specify a startup preference

Startup preferences are added to the end of the ini file. What is important is that they are specified after the line "-vmargs". If this line does not exist in the ini file then you have to specify this first.

Example

warqs	
-Domx_trace.level=max	

## **Administrator Rights**

You can use this only to set the password for the database in the GUI preferences. You also have to be a TD/OMS administrator before this works. This option does nothing else. You cannot use it to elevate your rights

# Restrict the list of applications to load

You can use this setting to only load a number of applications

,	
-Domx.applications=DEMO,FIN,POLIS	

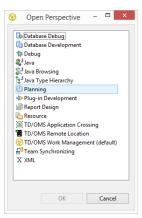
## Location of the TD/OMS local settings

You can use this setting to move the local settings to a different directory. Normally the local settings are stored in a .remain directory in the user's home directory. If you do not want this then specify:

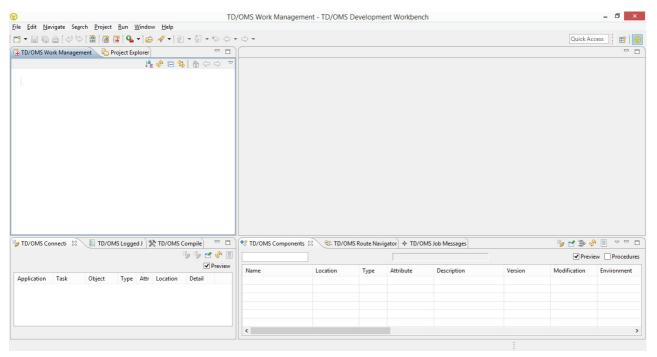
-Domx.config.dir=c:/new/location
or
-boww.comfig.dir=/other/location/univ

# View and perspectives

Eclipse uses perspectives. A perspective is a bundle of eclipse-views that will be opened together. Start the client and choose the TD/OMS Work Management perspective



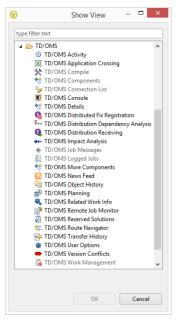
This perspective contains several views. Which views are displayed depends upon the saved (default) configuration of the selected perspective.



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# Opening a view

TD/OMS contains more views. Use Window->Show View->Other... to show the TD/OMS folder containing the TD/OMS views:

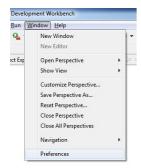


The views that are already open are grey and the views that are not shown (yet) are displayed in black. Any opened view will be shown again when the workbench is restarted until the perspective is reset to its default. Use Window-Save Perspective as ... to save the active perspective. Please be aware that you will replace the current default when you select the TD/OMS perspective name.

# Defining the system

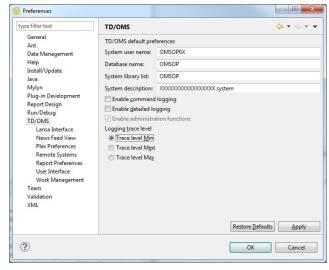
An unlimited number of systems running TD/OMS can be accessed from the workbench. Each system needs to be defined only once. The definitions will be saved when the client shuts down.

All defined systems are visible in the Work Management view. Bringing the TD/OMS Work Management view to the front will show that it is empty. Because the Work Management View is the center of TD/OMS, the systems running TD/OMS need to be defined. Preferences are set in the Preference view. Amongst other things, this is where you can define remote systems.



## Setting the TD/OMS default preferences

In the preference view, there is a tree node where the main TD/OMS preferences can be set. If you select the TD/OMS node, a panel appears on the right side. In this panel you can set values that serve as a reference for the remote systems to be defined.



The following values can be set:

### System user name

Specify the system user name that will be used to work with TD/OMS. This username, its user class or group profile must be defined in TD/OMS.

### Database nam

Specify the name of the database (TD/OMS library).

### System Library Lis

Specify the list of libraries that make up the set of libraries with which TD/OMS runs properly. This is at least the TD/OMS library, added with other TD/OMS (module) related libraries and libraries containing your own programs. This library list is used when TD/OMS related functions are executed

## System description

Fill this field with the template value or leave it blank.

### Debugging options

If you specify the debugging options, you will activate command logging, detailed logging and/or a certain level of tracing. The tracing can be seen through the TD/OMS Console view (see 2.19). These settings are normally only activated on request of the TD/OMS helpdesk.

## Enable administration functions

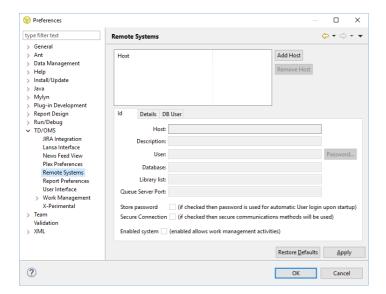
This value will be set based on the selections made during installation. A check mark indicates that administrative activities (such as setting/changing the Database User) can be performed from within this installation. You must re-install the software to change this value.

Press the Apply button to store the values.

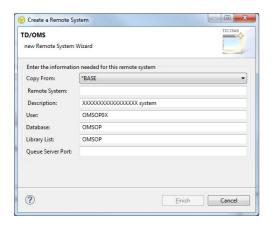
## Creating a remote system

Expand the TD/OMS preference node, you are now able to see your remote systems by selecting the Remote Systems node.

Already defined systems are displayed in the upper right panel. The preferences of a remote system are shown in the lower right panel after selecting a Remote System in the upper right panel

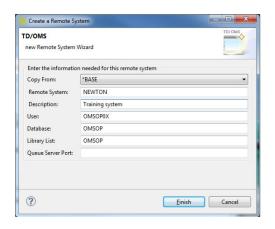


Since there are no hosts defined press the Add Host button. This will start a wizard.

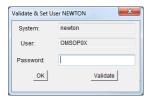


In the first field, you can select one of the hosts already defined or the special value \*BASE. This value will use the predefined set of parameters you have entered earlier. The \*BASE has been automatically selected as this is the first (and only) definition available at the moment.

Enter the TCP/IP name through which the remote IBM i can be reached (e.g. mysystem or mysystem.company.com), enter/change the description and press the Finish-button.



The login window will be displayed to enable you to enter the password.



If this window does not appear then your system cannot be reached. You probably have used an invalid system name. Try to ping this name on a Windows-command-line:

Enter the password for the user. If the user or password is wrong a warning will appear.



You can return to the password entry screen by pressing the Retry button or return to the wizard screen by pressing the Ignore button. A valid and active user is required to create a new Remote System.

The Remote system will be displayed in the TD/OMS Work Management view. The icon shown indicates the status:

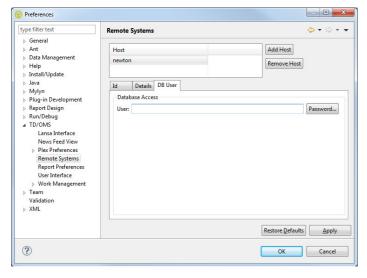
- A IBM i icon indicates that the definition went fine.
  - A yellow triangle 🙆 or lock 🔒 symbol indicates that there were problems to open the connection.

## **Setting the Database User**

In most cases the yellow triangle is caused by the fact that no Database user has been defined yet. The defined user may (and most likely will) not have sufficient access rights to the TD/OMS database and the required services (e.g. setting up a jdbc connection). You can resolve this by entering a user with sufficient authorisation in the Database user field (Select the Remote System and than select the DB User tab).

Only TD/OMS administrators that are in administration mode are able to set the database user. You can enter administration mode by supplying the following settings in the TDOMS.ini file or in the eclipse.ini file of a Rational installation.

-vmargs -Doox.admin=true



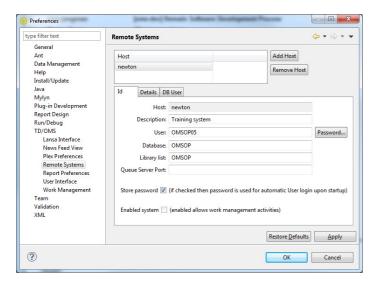
Enter the DB User and press the Password button (ask your TD/OMS administrator to do this when you are unable to enter characters in the user field).

You will be asked for the DB User password. After entering this password you must press the Apply button to store the DB User information on the IBM i system. The Database user name and password will ONLY be retrieved when the Remote System is opened. This means that the database user name is not displayed for a locked system when you restart the client. Storing the DB User password can only be done by the TD/OMS manager or by a user with a user class of \*SECOFR or \*SECADM.

Close the Preferences screen by pressing the OK button. Select Close in the context menu (right click on remote system in work management view). The  $\stackrel{\triangle}{\omega}$  changes into  $\stackrel{\triangle}{\omega}$ . Select **Open** in the context menu and enter your password. The  $\stackrel{\triangle}{\omega}$  will change into  $\stackrel{\triangle}{\omega}$  when no problems are found.

The host will be locked automatically in most other cases. Check the definition, make the required changes and try to open the connection by selecting Open in the context menu (right click on remote system in work management view). The TD/OMS console view (see 2.19) supplies more information when the open fails.

You can indicate that the User name and password must be stored on the client by placing a check mark in the Store Password check box on the ID tab.

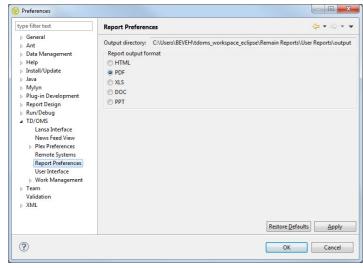


The Password button can be used to change the password stored (required after the password has been changed on the IBM i). Press the Apply-button on the Remote Systems preference page to store the password permanently. Information is encrypted before it is stored. Next time the client is started, it will logon automatically.

Remove the check mark in the **Store Password** check box to indicate that you (no longer) want to store the encrypted password on your client. Not storing the password means that you must enter the password when the Remote System is accessed for the first time after (or during) start up of the client or when the Remote System is opened.

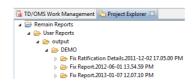
## Other TD/OMS preferences

#### Report preferences

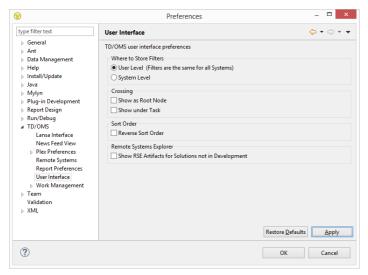


The report preferences are used when running a system/user report from the context menu

The reports are stored in the location specified in the output directory in the format selected. Reports are not removed after you close the report view. You can use the Project explorer view to gain access to these reports again.



User interface



In most cases filters created (see 2.1) can be used for every Remote System that you define. Selecting **User level** will have the effect that the filter will only be stored once but displayed for every Remote System defined. A filter can be created/changed/delete from any of the defined Remote Systems.

#### Selecting System level means that:

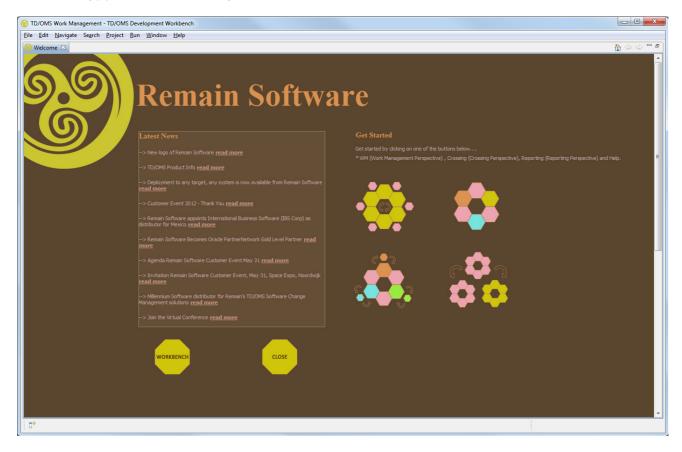
- 1. Any filter created while on **User level** is no longer visible.
- $2.\ A\ filter\ has\ to\ be\ defined/changed\ multiple\ times\ when\ relevant\ for\ multiple\ Remote\ Systems.$

System level filters will be removed when the Remote System is removed.

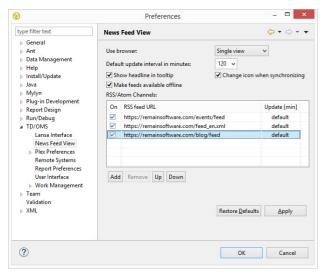
The **Sort order** can be reversed to show the Task node as the first node when this is not the case.

#### News preference

The TD/OMS welcome page gives access to the TD/OMS news items published on the TD/OMS website.



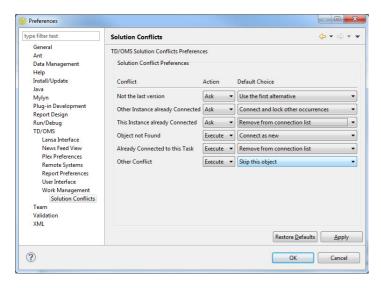
You can enable/disable your client to search for new news (new items will briefly pop-up) and the interval to use when enabled.



It is better to disable the search when the client can not access the internet.

#### Solution Conflicts preference

The kind of solution conflicts that are automatically resolved by the connection list process depend on the Solution Conflicts definition of the TD/OMS preferences



You can specify two kinds of actions:

### Ask

You will be requested to select the appropriate action (the default choice has already been selected) and to confirm your selection.

### Execute

The process will (try to) perform the specified default choice.

Each conflict has a specific set of default choices that can be selected. </translate> <translate>

# Using the views

Each TD/OMS view offers a specific way of looking at the TD/OMS information. However, views offer more than just a query on the TD/OMS-database. The Context-menu (shown through right-click on a element of the view) offers you all the possible actions for the selected element. These can be actions like **Move/Copy** and **Disconnect** when the selected element is a solution or **Direct connect** when the element is a object in the Component view. Only the actions that make sense for the selected element (task, solution, request etc.) will be shown / enabled in the context-menu.

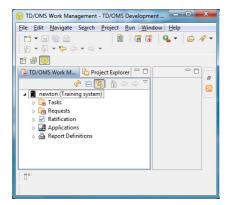
Some actions will only be enabled based on a selection made in another view (you can only use Direct connect in the Components view when you first select a Task in the Work Management view) or on other criteria such as the TD/OMS registry settings.

Another characteristic of views is that views react on the selection made in a different view. So will the Component view be updated when you select a different application in the Work Management view and will the Object History view be updated when you select a (different) Component in the Components view.

A detailed description of the possible Context menu actions can be found throughout this manual. A reference is made to this detailed description when applicable

# TD/OMS Work Management view

All defined hosts will appear in the Work Management view.



Under the system some nodes will appear. The number of nodes will vary depending on the number of installed TD/OMS-modules and plug-ins. The nodes represent the main TD/OMS entities of the TD/OMS work management

The most important nodes are:

Shows lists of tasks, each one defined by a filter. Every list may contain tasks of different applications.

## Requests

Shows lists of requests, each one defined by a filter. A list may contain requests from different applications.

#### Applications

Shows lists of applications, each one defined by a filter.

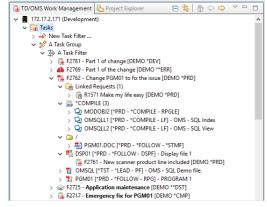
#### Ratification

Shows a list of the ratification groups of which you are a member for all application/environment combinations defined.

Shows the canned and user defined reports that are currently defined. It enables you to create, run and modify reports.

The nodes enable you to perform software change management related activities in the most efficient way. The node details can be made visible by expanding the node (pressing the + character in front of the node name). Most nodes require that you define your own filter to group related information. These filters will be explained in detail.

The first node in the Work Management view contains Filters with your Tasks. Before you can see tasks you must create a Filter which is explained in the next section. When a Filter is expanded, it shows the Tasks included in that Filter which could be in turn included in a Filter Group. Like you see in the next figure.



The decoration (icons, description and font) of the Task tells you immediately what the status is of the Task

# F2781 - Part 1 of change [DEMO \*DEV]

This is a Task without any problems. It is not assigned to the current logged in profile because the text is not bold face. The Task is in application DEMO and it has components in \*DEV.

♠ F2769 - Part 1 of the change [DEMO \*\*ERR]
This task was deployed but the deployment failed. Use **Show in/Remote Job Monitor** to find the failed deployment. See the TD/OMS Remote Job Monitor view on how to confirm the remote transfer.

#3 F2762 - Change PGM01 to fix the issue [DEMO \*PRD]
This Task has items that are in version conflict with items from another Task. Expand the Task to find the conflicting items or right click the task and choose **Show in/Version Conflicts**. Expand one of the conflicting items to find the conflicting Task.

## F2725 - Application Maintenance [DEMO \*\*DST]

This Task is assigned to you, the current logged in user. This is visible from the bold font. Also the Task is currently being deployed. Use Show in/Remote Job Monitor to find the pending deployment and possibly confirm it (TD/OMS Remote Job Monitor view.)

### F7271 - Emergency fix for PGM01 [DEMO \*CMP]

This is a completed Task (Strikethrough, \*CMP) that was assigned you (bold face)

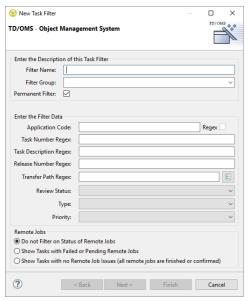
## Create a Task Filter

Expand the node called Tasks



Double-clicking New Task Filter... starts a dialog for specifying the selection criteria. A task must pass ALL criteria to be selected.

If Save is not checked, the filter will be deleted when the client is closed!



Define the name of the filter. This is also the name the filter is saved with so some restrictions apply

# Filter Group

When specified, a filter group is created that contains the filter. It is convenient to group filters if you have a large number of filters.

## Permanent Filter

If you uncheck this then the filter will become a session filter which will be removed after restart.

## Application Code

Specify an application code or a Regular Expression like  $\emph{DEM}.*$  or  $(\emph{ORDER}|\emph{TOOLS}).$ 

# Regex

Will cause the tasks to be selected in the client rather than in the database request. It is therefor slower but more flexible.

# Task Number Regex

Type a regular expression to find the Task number like F0122 or F01.\* Task Description Regex

Type a regular expression to find the Task description like .\*decimal.\* Release Number Regex

Key a regular expression to find the Task release like V3R0M0 or V3.\*

# Transfer Path Regex

Key a regular expression to find the Task with the request Transfer Path like **DB** or **(DB|WIM)** or **D\***. You can press the list button ([]) to get a list of all available transfer paths.

Select the ratification status to filter the Task.

# Туре

Select the Task Type that the tasks must be filtered by Priority
Select the Priority the tasks must be filtered by.

- Do not filter on status of remote jobs
   Show Tasks with Failed or Pending Remote Jobs
- Show Tasks with no Remote Job Issues

### Regular Expression

For some fields, a Regex (Regular Expression) can be specified. A regular expression is a very sophisticated way of specifying wildcards that goes far beyond the well known Windows wildcards \* and ?.

A thorough treatment of regular expressions is outside the scope of this manual. Remember the following:

Character	Meaning	Windows-wildcard
	An arbitrary character	?
*	Zero or more occurrences of the preceding character	
*	Any string	*

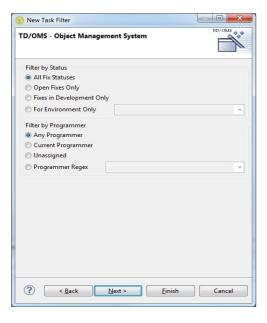
# Examples:

Expression	Matches
A*C	C, AC, AAC
A.C	AAC, ABC, ACC, ADC
(DEMOITOOLS)	DEMO or TOOLS

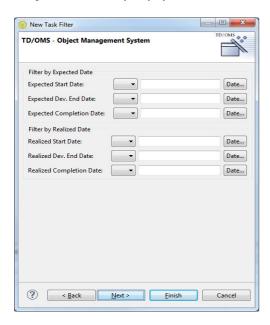
Regex logic will only be applied to the Application code definition when the related checkbox is checked.

You can indicate to the filter mechanism that no filtering on a specific field is required by leaving it blank. Press the Next button to enable you to specify a selection on status and/or programmer.

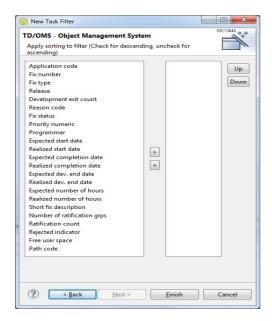
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Pressing the Next button will enable you to specify a selection on one or more dates.



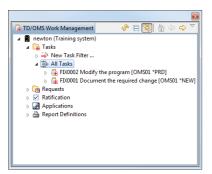
Pressing the Next button will enable you to specify the fields to sort on and the sorting sequence.



The tasks will be sorted on application (ascending) and Task number (descending) when no sorting criteria are specified.

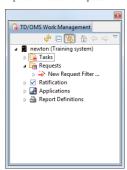
Press the Finish button and all tasks that pass the filter criteria will appear. Note that the list can contain tasks from several applications, as shown in the decorators (the text between the [....]).

You can define as many filters as you like.



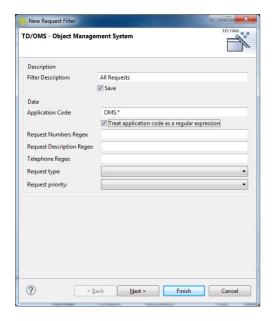
### Defining a Request Filter

Expand the node called Requests.



Double-clicking New Request Filter... starts a dialog for specifying the selection criteria. A request must pass ALL criteria to be selected.

If Save is not checked, the filter will be deleted when the client is closed!



For some fields, a Regex (Regular Expression) can be specified. A regular expression is a very sophisticated way of specifying wildcards that goes far beyond the well known Windows wildcards \* and ?.

A thorough treatment of regular expressions is outside the scope of this manual. Remember the following:

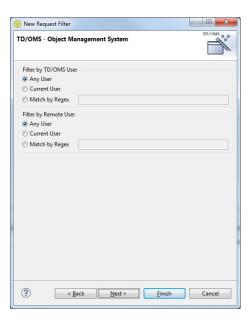
Character	Meaning	Windows-wildcard
	An arbitrary character	?
*	Zero or more occurrences of the preceding character	
.*	Any string	*

Examples:

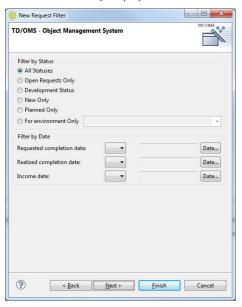
Expression	Matches
A*C	C, AC, AAC
A.C.	AAC. ABC. ACC. ADC

Regex logic will only be applied to the Application code definition when the related checkbox is checked.

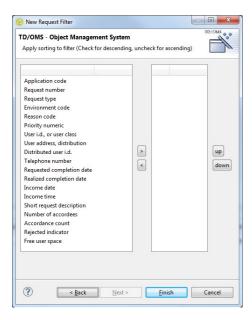
You can indicate to the filter mechanism that no filtering on a specific field is required by leaving it blank. Press the Next button to enable you to specify a selection on TD/OMS and/or Remote user.



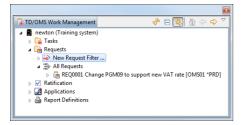
Press the Next button to enable you to specify a selection on status and/or various dates.



Pressing the Next button will enable you to specify the fields to sort on and the sorting sequence.



Press the Finish button and all Requests that pass the filter criteria will appear. Note that the list can contain requests from several applications, as shown in the decorators (the text between the [....]). You can define as many filters as you like.

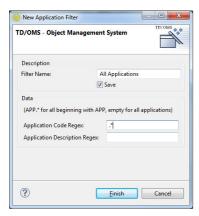


### **Defining an Application Filter**

Expand the node called Applications.



Double-clicking New Application Filter... starts a dialog for specifying the selection criteria. An application must pass ALL criteria to be selected. If Save is not checked, the filter will be deleted when the client is closed!



For some fields, a Regex (Regular Expression) can be specified. A regular expression is a very sophisticated way of specifying wildcards that goes far beyond the well known Windows wildcards \* and ?.

Remember the following:

Character	Meaning	Windows-wildcard
	An arbitrary character	?
*	Zero or more occurrences of the preceding character	
.*	Any string	*

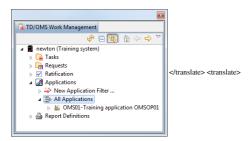
Examples:

Expression	Matches
A*C	C, AC, AAC
A.C	AAC, ABC, ACC, ADC

You can indicate to the filter mechanism that no filtering on a specific field is required by leaving it blank.

Press the Finish button and all Applications that pass the filter criteria will appear. Note that the list can contain requests from several applications, as shown in the decorators (the text between the  $[\ldots]$ ).

You can define as many filters as you like.



# Creating a request

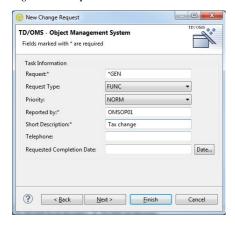
You can start creating a new request by choosing New->Request from the context-menu in any TD/OMS view or by pressing the New Change Request 3 button in the toolbar. This will start the New Change Request wizard.

Page 1 - Enter System and Application

New Change Reque	st	
TD/OMS - Object M	anagement System	TD/OMS & A
Id Information		
Host Name:	newton	<b>*</b>
Application Code:	OMS01	•
	Next > Ein	ish Cancel

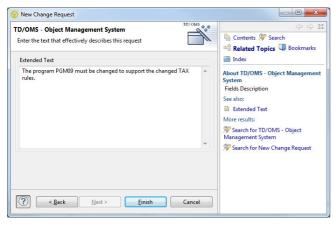
The Host (Remote system) name is already filled in and can not be changed when a detail line of a Remote system has been selected within the TD/OMS Work Management view. Select the Host name when this is not the case and select/change the Application if required. Press the Next-button.

Page 2 - Enter Request Attributes



All fields indicated with an asterisk are required. Specifying \*GEN for the Request will instruct TD/OMS to generate the request number based of the application specific settings. Overwrite the \*GEN value to avoid this default behaviour. Press the Finish-button if there is no requirement to enter extended text or press the Next-button if there is.

Page 3 - Enter Extended Text Description



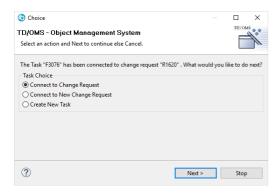
Enter the extended text (if needed) and press the Finish-button.

You can press the question mark button in the lower left corner to obtain context sensitive help. Adding a request may fail in which case you will receive an error message.

Page 4 - Continue



After generating a Request the wizard will show the Choice screen. This screen informs you about the action performed and enables you to immediately initiate the next step (Connecting a (new) Fix) or repeat the current activity (Creating a Request).



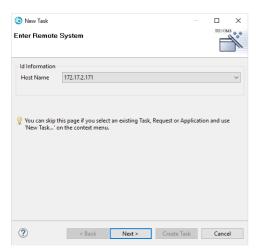
You can press the Cancel-button to end the wizard. </translate> <translate>

#### Creating a Task

You can start creating a new task by choosing New->Task from the context-menu in any TD/OMS view or by pressing the New Task 🌋 button in the toolbar. This will start the New Task wizard.

# Page 1 - Enter Remote System

This page will not be shown when you have started the wizard and the context could have been determined from the current selected element. The Host (Remote system) name is already filled in and can not be changed when a detail line of a Remote system has been selected within the TD/OMS Work Management view. Select the Host name when this is not the case and press the Next-button.



Page 2 - Enter Task Attributes

All fields indicated with an asterisk are required. Specifying \*GEN for the Fix will instruct TD/OMS to generate the fix number based of the application specific settings. Enter a long description (if needed). Press the Finish-button if there is no requirement to enter Task Project information or press the Next-button if there is.

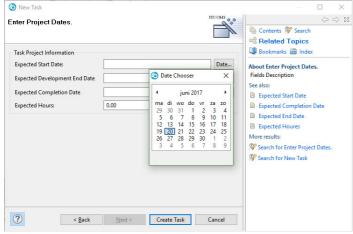
O New Task				$\square$ $\times$		
Enter Task Attributes. Fields marked with * are required						
	72.17.2.171/DEMO)					
Application	DEMO ~					
Task*	*GEN	Path		~		
Туре	WISH ~	Release	V1R0M20	~		
Priority	NORM ~	Programmer*	WIM	~		
Task Description*	This is a Task					
				^		
?	< Back	Next > C	reate Task	Cancel		

#### Fields

- Application
- Task
- Transfer Path
- Task Type
- Release
  Priority Code
- Programmer
- Short Task Description
- Extended Task Description

### Page 3 - Enter Project Dates

Enter the Task Project information (if needed) and press the Finish-button. You can press the question mark button in the lower left corner to obtain context sensitive help. Please note that you can also use the planning view to manipulate the project dates

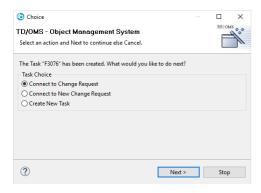


# Fields

- Expected Start Date
- Expected Development End Date
- Excepted Completion DateExpected Hours

## Page 4 - Continue

Adding a Task may fail in which case you will receive an error message. After generating a Task the wizard will show the Choice screen. This screen informs you about the action performed and enables you to immediately initiate the next step (Connecting a (new) Request) or repeat the current activity (Creating a Task).



You can press the Stop button to end the wizard. </translate> <translate>

# Connecting a Component to a Task

Solutions are components (objects, IFS files, 4GL objects), messages and source members that are connected to a task. Expanding a task shows the solutions already connected to that task.

This section describes the following:

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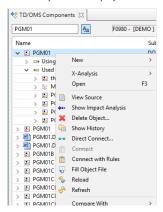
- Connecting an object to a task
- Connecting a member to a taskConnecting a message to a task

Creating a solution requires using the TD/OMS Work Management view and the TD/OMS Components view. Depending on the method chosen the TD/OMS Connection List view can be used during the process.

Ensure that the following steps are/have been taken:

- Open the TD/OMS Work Management view
- Select the task that must accept the solution(s)
- Right-click the task to show the context menu
- Select Show in.. / TD/OMS Components

Once the components view is open you can find the required component by searching for it in the quick search box or by applying a filter. Right-click the desired component, member or message to show the connect options



The menu contains 3 options for creating solutions:

Components are immediately connected to the task that is selected in the TD/OMS Work Management view. This is done by

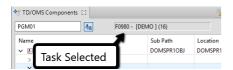
- running the connection rules if required by this registry setting.
- adding the objects to the Connection List
- starting processing of the connection list

The selected components are made visible in the Connection List view, Components in the Connection List view can be removed from the Connection List or assigned to another group (task). The components in the Connection List can be transformed into solutions by pressing the of Process Connection List button on the TD/OMS Components view or the TD/OMS Connection List view.

If the Connect option is disabled then only connection with rules is allowed (by using Direct Connect or Connect with Rules

The connection rules defined within TD/OMS are applied to the selected components. The selected components and the (additional) components meeting the selection criteria are made visible in the Connection List view. Components in the Connection List view can be removed from the Connection List or assigned to another group. The components in the Connection List can be transformed into solutions by pressing the selection criteria are made visible in the Connection List or assigned to another group. The components in the Connection List can be transformed into solutions by pressing the selection criteria are made visible in the Connection List or assigned to another group. Connection List button on the TD/OMS Components view or the TD/OMS Connection List view.

Note that the Connect options only work as expected if a task is selected in the Work Management view. If no task is selected then the component will still be added to the connection list but not where you might expect it. The selected task is visible in the header of the view



In addition, this feature (the context-menu on a list or tree-item depends on the item itself and on selected items in other views) is applied wherever possible. The availability of certain Connect action is also dependent on authorisation, TD/OMS registry settings and task status (Connect can not be used when task status is \*CMP (Completed)).

### Connecting a source member or message to a task

The procedure to attach a member from source file (if it is not already a source of a component) or a message from a message file is done in the same way as stated above. Please note that there is a separate Details view to better search for the required member or message. You can open the Details view as usual by using the Quick Access field in the toolbar or by selecting a Message File or a Source File and using the context menu Show in ... / TD/OMS Details view. </translate>

### **Creating a New Object Template**

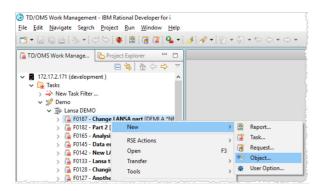
New Object Templates are used to quickly create a new object. The template already fills in a number of fields that no longer have to be typed in manually.

New Object Templates can be created from the New Object wizard. Right click on a Task and select 'New/Object...' to show a list of available templates. The tutorial below shows this process

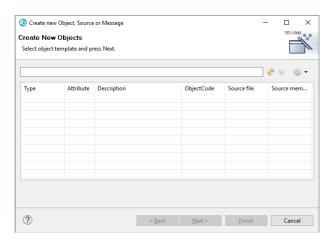
Do the following:

- Open the TD/OMS Work Management view
- Select the task that must accept the solution(s)
- Right-click the task to show the context menu
- Select New/Object...

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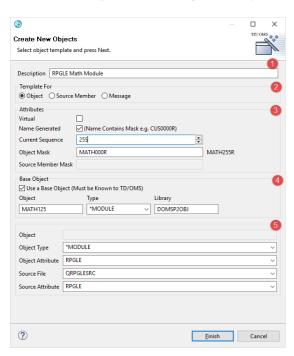
A list with all available object templates will pop up:



As you can see, the list is empty so let's add your first template. If your list is not empty, just follow the steps along.



Click on the arrow next to the gear icon in the toolbar. This opens a menu where you are able to select "Add..." to add a new New Object Template to the list. The following dialog will open:



1. Description

Type a description of the Template. In this case we are going to create a template for our MATH module series.

2. Template Type

You can create templates for Objects, Source members and Messages. Pick your type here.

#### 3. Attributes

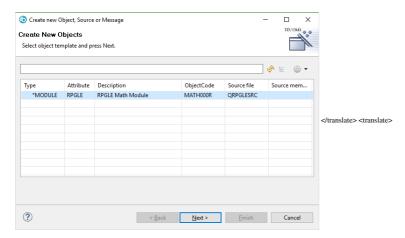
In this section you can specify if the object should be a virtual object or not. Also you can indicate whether the name of the object needs to be generated based on a sequence number. For this we use a name template containing a string of ZEROS and a sequence number. In this case the name template is MATH000R and we start the sequence at 255. So the next object name will be MATH256R. If you use a name template then it is not possible anymore to manually specify an object name. If you do not use the name template then the object name must be specified after selecting this template.

Specify the base object that we use to copy the source from for any new object that we create with this template. The object that you specify here MUST be an existing object in the TD/OMS database.

#### 5. Other Attributes

Specify what type of object you are creating and what the source file and the source member attribute should be.

After you have pressed Finish the object will be added to the list of available templates. To create an object based on this template, select the line in the list and press Next.



## Connecting a new Object

Solutions are components (objects, IFS files, 4GL objects), messages and source members that are connected to a task. Expanding a task shows the solutions already connected to that task.

This section describes the following:

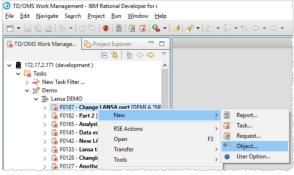
- Connecting a new object to a task
- · Connecting a new member to a task
- Connecting a new message to a task

Ensure that the following steps have been taken:

- Open the TD/OMS Work Management view
- Select the task that must accept the solution(s)
   Right-click the task to show the context menu
- Select New/Object...

# Creating a new Object Template

Creating a New Object Template can be done by using the menu described below. It is described in detail here:



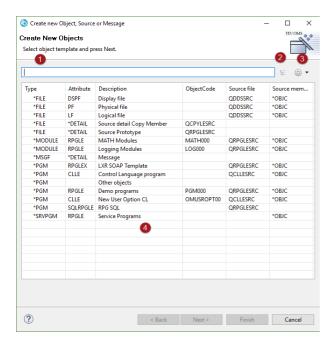
### Selecting an Object Template

New Object Templates are templates to create a new object. If you create a new object regularly then it is useful to create template where most of the fields are already filled in. We will take a new RPGLE module as the basis of this

With the new object template you can also let TD/OMS generate the object, member or message code with a sequence number as we will see later.

A dialog will open where you can select, add, change or delete a new object template.

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#### 1 Filter

The filter box can be used to select a template if you have many. Just type some description or an object type or attribute and the matching templates will be shown

#### 2. Presentation

If you have many filters then sometimes it is easier to view the list in a tree form (see next picture)

#### 3. Menu

This box enables you to add, create or delete a new template record. Press the little arrow next to the gear icon to open a menu.

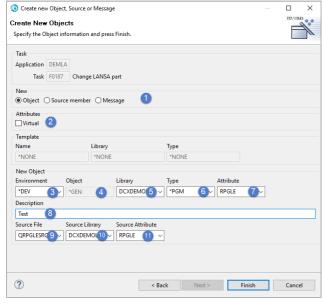
#### 1. List

This is the list with object templates.

The Object Template file (OMNOT) is shipped with a number of default records but you can add more templates to this file. Please follow this link to see how.

#### Create a New Object

When a new native IBM i Library Object is selected, the object button is checked 1.



### Wirtual

rtual
Select the virtual button if you want to create an object which is virtual or temporary. A temporary object can be a work file to which programs relate but only exist for the duration of a job.

### Environment

Select an Environment where the Object must be created. The Environment that can be selected depends on the Application of the selected Task. Only Development and optionally an Emergency Environment can be selected.

### Object

Enter the name of the new Object. If the name already exists a warning will be displayed. The name must adhere to the naming conventions on the IBM i.

### 6 Library

Select OR Enter the name of the Library. The Libraries to be selected are depending on the Application of the Task and the selected Environment. If the Library is not part of the selected Environment as a valid Library where Objects can be created then a warning will be displayed.

### Туро

pe Select OR Enter the desired Object Type. The list is populated with a list of Object Types from the Application of the selected Task but the list can contain invalid Types or Types can be missing. If this is the case, enter the Type manually, e.g. \*PGM.

## Attribute

Select OR Enter the desired Object Attribute. This will also be the Source Attribute so take good care what you fill in this field because it will affect the editor that is opened AND possibly the compile that is executed. Select the Attribute from the list but note that the list is populated with a list of Object Attributes from the Application of the selected Task in combination with the selected Object Type. The list can contain invalid Attributes or Attributes can be missing. If this is the case, enter the Attribute manually, e.g. RPGLE.

### Description

Enter the desired Object and Source Description.

#### Source File

Select OR Enter the desired Source File to create the Source Member in. The Source Member will have the same name as the Object. The Files to be selected are depending on the Application of the Task and the selected Environment.

## Source Library

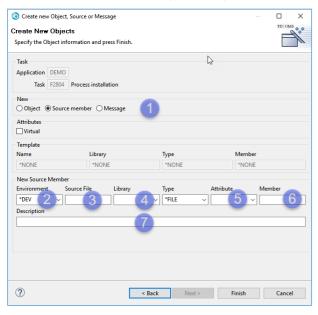
Select OR Enter the desired Source Library to create the Source Member in. The Libraries to be selected are depending on the Application of the Task and the selected Environment. If the Library is not part of the selected Environment as a valid Library where Source can be created then a warning will be displayed.

#### 🚳 Source Attribute

Select OR Enter the desired Source Attribute of the Source Member. The attributes in the combo box are all attributes known to TD/OMS. You can specify an attribute manually if the one you want to specify is not in the list.

#### Create a New Source Member

When a new native IBM i Source Member is selected (\*FILE, \*DETAIL) the Source member is checked



#### Environment

Select an Environment where the Member must be created. The Environment that can be selected depends on the Application of the selected Task. Only Development and optionally an Emergency Environment can be selected.

#### Source File

Select OR Enter the desired Source File to create the Source Member in. The Source Member will have the same name as the Object. The Files to be selected are depending on the Application of the Task and the selected Environment

#### Source Library

Select OR Enter the desired Source Library to create the Source Member in. The Libraries to be selected are depending on the Application of the Task and the selected Environment. If the Library is not part of the selected Environment as a valid Library where Source can be created then a warning will be displayed.

### Attribut

Select OR Enter the desired Source Attribute. Select the Attribute from the list but note that the list is populated with a list of Object Attributes from the Application of the selected Task in combination with the selected Object Type. The list can contain invalid Attributes or Attributes can be missing. If this is the case, enter the Attribute manually, e.g. RPGLE.

### Member

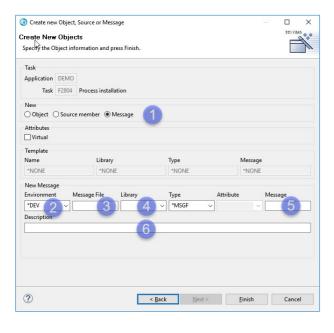
Enter the name of the new Member. If the name already exists a warning will be displayed. The name must adhere to the naming conventions on the IBM i.

### Obscription

Enter the desired Object and Source Description.

## Create a New Message

When a new native IBM i Message in a Message File is selected (\*MSGF, \*DETAIL), message is checked



Environment

Select an Environment where the Message can be created. The Environment that can be selected depends on the Application of the selected Task. Only Development and optionally an Emergency Environment can be selected.

#### Message File

Select OR Enter the desired Message File to create the Message in. The list of Message Files is populated from the known Message Files in the Application of the selected Task. Enter one manually if it is not in the list.

# 6 Library

Select OR Enter the desired Library. The Libraries to be selected are depending on the Application of the Task and the selected Environment. If the Library is not part of the selected Environment as a valid Library where the Message File is located, a warning will be displayed

Enter the name of the new Message. If the name already exists a warning will be displayed. The name must adhere to the naming conventions on the IBM i.

Enter the desired Message Description

</translate> <translate>

#### The Transfer process

Object transfer is initiated by choosing Copy Transfer or Move Transfer in the context-menu for a request, a task, or one or more solutions

Usually copying is used when transferring from the production environment, whereas in other cases moving is used.

Transfer may take place either in batch or interactively but interactive transfer may be disabled due to the TD/OMS configuration settings.

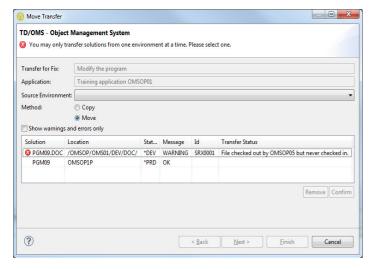
The process of transfer consists of the following actions:

- 1. Determining the sequence of processing
- 2. Update version number (when leaving development)
- 3. Create object and source in the new environment
- 4. Distribute (in case of a remote sub environment)
- 5. Update status of the solution
- Remove sources and objects from old environment
   Update task status
- 8. Update relationships

Also keep the following in mind:

- During this process one or more actions and/or exceptions may be executed at the predefined exits. Each action/exception can contain one of more user defined programs. The actions/exceptions and the relation to the user defined programs is registered with the TD/OMS configuration functions and can not be influenced from within the client or during the transfer.
- Creation of an object is usually done by using the CRTDUPOBJ command. Logical files are always compiled. Users who like to handle the creation of objects themselves and not use the defaults are enabled to do so by specifying Actions and/or Exceptions
- Data conversion of physical files during transfer is supported by TD/OMS. The standard TD/OMS data conversion applies the copy file command with \*MAP and \*DROP specified for the relevant parameters. The TD/OMS configuration functions must be used to specify one of the other TD/OMS data conversion methods (copy from different file name, execute conversion program or copy with data) before the transfer is executed
- A special transfer is the so-called horizontal transfer. In this case, a task is transferred within an environment, from one sub environment to another. The most important reasons for using a horizontal transfer are:
  - To transfer a task from one programmer to another in a development environment where every programmer has his/her own sub environment.
  - To distribute a task to a remote machine again when the processing on a remote machine has failed for whatever reason.
  - To implement a task in a (remote) sub environment at a later moment than the local production environment

After selecting the Copy Transfer or Move Transfer action the transfer process will collect the required information, perform the pre processing validation and display the result.

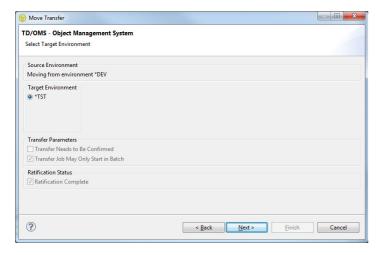


You can limit the display to the solutions with a warning or error by ticking the checkbox. Depending on the error you may "solve" the problem by selecting a specific Source environment, a different Method or by pressing the Remove/Confirm button after selecting a line. Some errors may force you to cancel the transfer process and resolve the problem before you can continue. The Next button can only be pressed after resolving all errors.

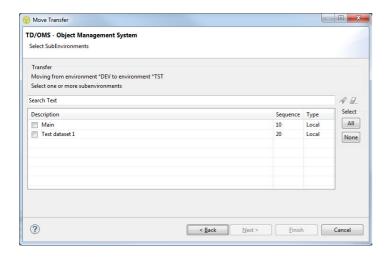
The second screen allows selection of the target environment. The next environment in the cycle is checked when only 1 selection is possible.

This screen also supplies information regarding the transfer parameters and the Ratification status. You will not be able to continue with the transfer when one or more ratifications have not been given or have been rejected.

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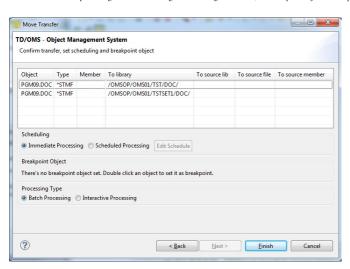
Pressing the Next button may result in the display of the sub-environment selection screen. Depending on the environment configuration, you are enabled to select 1 or more sub-environments or sub-environments are automatically selected for you and this screen will not be displayed.



Selection of sub-environments is the final selection step. When the next button is pressed the transfer process will execute several steps (e.g. execution of the pre-processing exceptions, version check, etc.) to generate the transfer processing data. Depending on the number of components involved some time may pass before this is finished. A screen is displayed informing you about the progress and the step being executed.

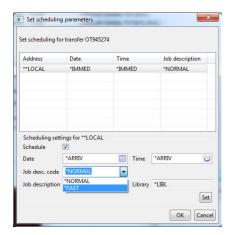


The final screen before processing starts allows setting the scheduling information, the breakpoint object and the processing type.



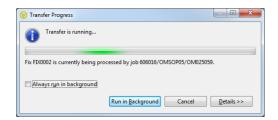
Selection of Interactive Processing may not be available due to the configuration settings.

After selecting the **Scheduled Processing** radio button you must press the **Edit schedule** button to display the scheduler settings. Press the Calendar button to select a different date and/or enter a time that will be in the future when you start the actual transfer. TD/OMS has two pre-defined Job description codes (\*NORMAL and \*FAST) to process transfer requests with different (priority) settings. The actual behaviour is determined by the job description attributes which are set by the TD/OMS or system administrator.



Changes made to the scheduling parameters are activated when the Set button is pressed. Pressing the OK button without pressing the Set button will result in the loss of any changes made after the last time the Set button was pressed.

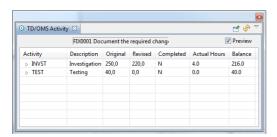
Pressing the Finish button will start the actual transfer.



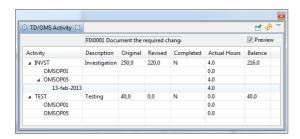
This screen is also shown when Batch Processing is selected as some preparation is required before batch processing can be done. You can press the Run in Background button to minimize the screen. <a href="translate">translate</a> <a href="trans

#### TD/OMS Activity view

The TD/OMS Activity View shows the registered activities for a selected task and the estimated, revised and actual amount of time.



The arrow can be pressed to show the details of that activity. The view menu in the header can be used to activate showing activity details for all users or only your own activity details.



The actions can be accessed by right-clicking on a activity (detail) in the view. Actions from within this view are:

- New Request and New Task
- Edit Activity
- Add Effort

Adding effort information can only be done for your own user but you can change/remove all effort information. </translate> <translate>

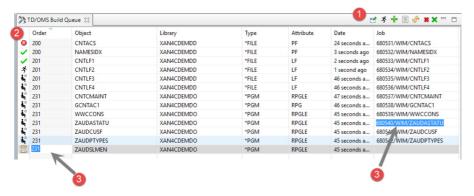
# TD/OMS Build Queue View

The TD/OMS Build Queue view enables to you build/compile one or more components in a Task.

You can open the Build Queue view by:

- Selecting a task or Solution and using the Show in .. context menu
- Using the quick-access box in the toolbar and typing build queue

If it is empty, select a Task in the Work Management view. The view will be populated with the all components that are in the Build Queue for the selected Task. If there are no entries in the queue yet, click the  $\frac{1}{4}$  toolbar item to add all entries from the Task to the build queue. If you want to add one or more Solutions instead of all components from the Task, simply select the Solutions that you want to add and click the  $\frac{1}{4}$  toolbar item to add them to the queue.



#### Toolbar Items

Use the toolbar (1) to execute action that operate on the queue or entries in the queue.

Click this icon to lock the view for further selection changes. When you select another Task, the view will not repopulate

#### ₹ Release Selected / Release Queue

Click this icon to release all locked items in the queue or to release only the selected items. Please note that it is possible to re-release a failed compile by selecting the failed compile entry and pressing this icon

### + Add all Development Solutions from Selected Task

When you select a Task in the Work Management view and then click this icon, all Solutions from the selected Task will be added to the queue. Hoover over the icon to read the tooltip. The tooltip will tell you what will happen if you press the icon.

#### - Add Selected Solutions

When you select one or more Solutions that are either in the development environment or in the emergency environment, these will be added to the Build Queue. Hoover over the icon to read the tooltip. The tooltip will tell you what will happen if you press the icon

Refresh the Build Queue List

## **■ Delete Selected Build Queue Entries**

All selected entries in the Build Queue will be removed from the Build Queue. This toolbar entry will only appear if a line is selected in the Build Queue list. Hoover over the icon to read the tooltip. The tooltip will tell you what will happen if you press the icon.

#### X Delete Completed Build Queue Entries

All successfully compiled Build Queue entries will be removed. This toolbar entry will only appear if nothing is selected in the Build Queue list. Use CTRL+CLICK to unselect an entry or press the refresh icons  $\sqrt[6]{n}$ . However, the present of t over the icon to read the tooltip. The tooltip will tell you what will happen if you press the icon

# The meaning of the line icons

The icon in front of the line (2) will tell you what the state of this entry is. Pressing the refresh 🧬 icon will rebuild the list to show you the latest state of the Build Queue. The meaning of the icons are:

# Meld Held

The entry is currently held. Select this line and press the Release 🛠 icon to release this entry for compilation. The icon will change to 📢 to indicate that the entry is waiting to be executed.

# **L**<sup>□</sup> Waiting

The entry is release from the queue and it waits for its turn to be processed. This icon will be shown if there are other entries preceding it which are also released ⊀ Running

This entry is currently being processed

# ✓ Success

Other Features

This entry was built successfully Fail

# The build of this entry failed

You can click the "Order", "Object" and "Date" column to sort the list on these entries

### Change the Build Order (3)

You can in and "Order" cell to change the sequence.

## Copy the Job Name (3)

You can click the "Job" cell to select the job number. The job number can then be used in the WRKJOB command

## Change and save the view layout

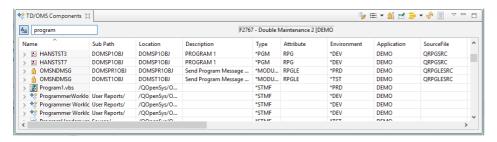
The columns within the view can be resized and the column order can be changed by dragging the columns into the preferred sequence. You can save this information by pressing the Save the current column ordering </translate> translate> The TD/OMS Components view shows information about the components within a application. A component can be an IBM i-object, a detail (like a message or a source member) an IFS-Object or a 4GL object like a CA/2E function or a LANSA file. The main functions of the Component View are to find your components, show component dependencies and details, show ILE procedures and their dependencies and connect components to a task.

The components view can do many more things, all of which are explained in the following sections

## The TD/OMS Components View

This can be done by:

- Selecting a Task and using the Show in .. context menu;
   Using the quick-access box in the toolbar and typing Components;
- Opening the Window/Show View menu
- Activating the view by clicking on its title in the bottom of the TD/OMS Work Management perspective.



# Finding a component

This section describes how to

- Find an native object like a program or a file
- Find a member in a source file
- Find a message in a message file
- Find a 4GL object
- Filter the list of objects showm.
- Find a component from related applications
   Restrict the type of components shown
- Looking for ILE procedures

Within the components view there are several methods to find the component you are looking for

#### Selecting a context

The first thing the view needs to start populating itself is a context. The context tells the view what components you want to see. For example, if you select a task in application DEMO, like we did in the screenshot above, all objects from the DEMO application will be shown. You can select a **Request** (3), a **Task** (2), an **Application** (4) and even a **System** (1). If you select your System, the view will show all components in that system. This enables you to quickly find any component on you system by further restricting the contents of the view by the various filters that the view provides.

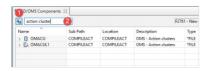


A context is set by selecting something in the Work Management main navigation view.

## Using the QuickFilter

The Quickfilter box enables you to quickly select the item that you are looking for.

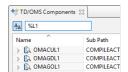
The Quickfilter has two modes which are controlled by the button next to the filter box



When the mode button is pressed then the QuickFilter is in relaxed mode. This is the default. It will not care about the case (e.g., program and PROGRAM will match) AND it will also look in the description. So if you want to find file OMACUL1 which is the "Action clusters" file then you can either type "action cluster" in the QuickFilter or omacul1 or OMACUL1.

n the button is depressed then the QuickFilter is in strict mode. It will only match on component name and will do so in a case sensitive mode. So if you want to find a component named OMACUL1 then you have to type

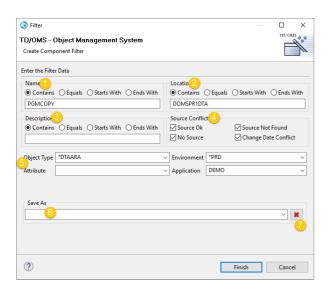
The Quickfilter box is a "starts with" selection for the object name but it uses an SQL like construct that you can influence by using the percentage sign:



## Activate and Define a filter

The Filters 🛸 - button in the toolbar of the view enables you to create filters for your object selection. These filters can then be activated by selecting them from the drop down box. After a filter is activated it will turn into "fire' 🖐 🔻 to indicate that a filter is active (or hot) for this view. The view will try to retain the filter across sessions. If you start again while a filter is active, a mini message will be show to notify you about this. If you don't see the results you excpect check if a filter is currently active.

You can quickly make a filter for an object by first setting the filter back to **Default** (🐞 🔻). Then select an object and click the Filter button. This will open the **Create Component Filter** wizard with all the relevant fields already filled in



Enter the name or partial name of the object you are looking for and specify the operator (contains, starts with, etc..)

(2) Location

Specify the name or partial name of the location (library, directory, 4GL repository, etc..) and also specify an operator.

(3) Description

#### Specify the description or partial description of the object you are looking for together with the operator. (4) Source Conflict

Specify the possible source status that you are looking for. You can find all components with a faulty source by selecting the appropriate field here and specifying a system context (see context above)

(5) Type, Attribute, Environment and Application Type the values directly or select them from the dropdown box.

## (6) Filter name

Specify the name of the filter that you want to save this filter with. If you do not specify a name the filter will be saved under a special name called ActiveSelection

#### (7) Delete filter

Select a filter from the dropdown box and press this button to delete it.

#### Select the number of components to load

Only a limited amount of information is retrieved from the TD/OMS database when the view is opened. The current limit is 500 components. You can speed up the loading of the view or see more components in the current selection by selecting a new value from the Show list size button :

You will notice that the view is more snappy if you select a lower value



#### Filter on component class

Pressing the Menu button enables you to include/exclude the various component classes.

#### IBM i

When pressed it will show native IBM i objects (\*PGM, \*FILE, etc..)

#### PHP Class

When pressed it will show PHP Class components (do not confuse these with PHP IFS files)

#### Detail Class

When pressed it will show Detail Class components (currently fields)

# 4GL

When pressed it will show 4GL components like LANSA files and CA/2E functions. IFS

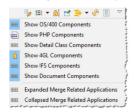
When pressed it will show IFS files

#### Document

When pressed it will show objects in the QDLS system.

# SOL

When pressed it will show objects of type SQL



### Merging in Components from related applications

When you have defined relationships between applications you are able to merge in components from these applications. These dependencies are known as Application Interfaces and you can find conceptual information about them here: Application relationships. Information on how to define them is here: Application Interface Maintenance

You can activate a view across the related applications by specifying one of the options below

### Expanded Merge

All Components from exporting (upstream) applications are shown

# Collapsed Merge

Components from exporting applications are shown if they are not already in the current selected application. In other words, only the most recent version in the context of the current selected application is shown.

### Exploring component dependencies

The related components can be made visible by pressing the arrow sign (expanding) in front of a component in the Components view. Related components are always part of a specific group. The possible groups are:

## Components ⇒ Using the component

A program reads a file. A program calls another program

### Components @ Used By the component

A program is called by another program. A physical is used by a logical.

# Component Pa Details

Independent members (i.e. NOT source members belonging to an object) from a source file and messages from a message file.

## Component in Imports

ILE procedures and data imported into this ILE program, module or service program. Component | Z Exports

ILE procedures or data exported by this module or service program

Component X and Y are related if:

- Program X calls program Y
- Program X processes file Y
   Program X uses data-area Y
- Program X contains module Y
- etc.

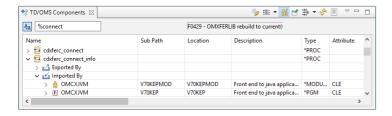
#### Exploring ILE procedure imports and exports

By clicking the **Procedures** checkbox in the toolbar of the Components view, switches the view from Component mode to ILE Procedure mode. The list will show all ILE procedures that are exported by modules or service programs in the application. When using ILE extensively it is sometimes hard to determine where the procedure is exported and who is using it it case you want to make a change. The possible groups are:

Component  $\mathbb{R}^2$  Exported by Shows the modules and service programs that export this ILE procedure.

#### Component 🕍 Imported by

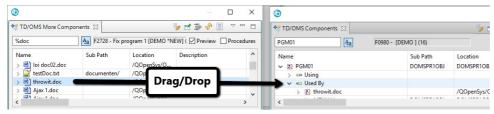
Shows the programs, modules and service programs the import this ILE procedure.



#### Adding Manual Dependencies

When a component is added to TD/OMS, its relations are built automatically. It is also possible to create a user defined relation by dragging a component to another component and dropping it in the Using or Used By group. Pausing on a group while dragging will automatically expand the group to show its contents. Manual expansion is also possible. Expansion can be done indefinitely.

You can use the TD/OMS More Components view to have two views. This enables you to select the component to be added if this component is not in the list



### Change and save the Component View layout

The columns within the view can be resized and the column order can be changed by dragging the columns into the preferred sequence. You can save this information by pressing the Save the current column ordering

### Connecting a Component to a Task

Solutions are components (objects, IFS files, 4GL objects), messages and source members that are connected to a task. Expanding a task shows the solutions already connected to that task.

This section describes the following

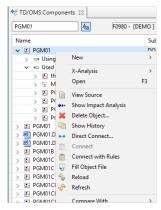
- Connecting an object to a task
- Connecting a member to a task
- Connecting a message to a task

Creating a solution requires using the TD/OMS Work Management view and the TD/OMS Components view. Depending on the method chosen the TD/OMS Connection List view can be used during the process.

Ensure that the following steps are/have been taken:

- Open the TD/OMS Work Management view
- Select the task that must accept the solution(s)
   Right-click the task to show the context menu
- Select Show in.. / TD/OMS Components

Once the components view is open you can find the required component by searching for it in the quick search box or by applying a filter. Right-click the desired component, member or message to show the connect options.



The menu contains 3 options for creating solutions:

Components are immediately connected to the task that is selected in the TD/OMS Work Management view. This is done by

- running the connection rules if required by this registry setting
- adding the objects to the Connection List
- starting processing of the connection list

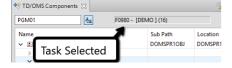
The selected components are made visible in the Connection List view. Components in the Connection List view can be removed from the Connection List or assigned to another group (task). The components in the Connection List can be transformed into solutions by pressing the F Process Connection List button on the TD/OMS Components view or the TD/OMS Connection List view

If the Connect option is disabled then only connection with rules is allowed (by using Direct Connect or Connect with Rules

## Connect with Rules

The connection rules defined within TD/OMS are applied to the selected components. The selected components and the (additional) components meeting the selection criteria are made visible in the Connection List view. Components in the Connection List view can be removed from the Connection List or assigned to another group. The components in the Connection List can be transformed into solutions by pressing the Process Connection List button on the TD/OMS Components view or the TD/OMS Connection List view.

Note that the Connect options only work as expected if a task is selected in the Work Management view. If no task is selected then the component will still be added to the connection list but not where you might expect it. The selected task is visible in the header of the view



In addition, this feature (the context-menu on a list or tree-item depends on the item itself and on selected items in other views) is applied wherever possible. The availability of certain Connect action is also dependent on uthorisation, TD/OMS registry settings and task status (Connect can not be used when task status is \*CMP (Completed)).

The procedure to attach a member from source file (if it is not already a source of a component) or a message from a message file is done in the same way as stated above. Please note that there is a separate Details view to bette search for the required member or message. You can open the Details view as usual by using the Quick Access field in the toolbar or by selecting a Message File or a Source File and using the context menu Show in ... / TD/OMS Details view. </translate>

### Processing the connection list

Components that have been added to the TD/OMS Connection List can be processed by pressing the process Connection List button

The actions relevant to components can be accessed by right-clicking in the TD/OMS Component view. The more commonly used actions from within this view are:

- Show information
- Source view
- Show Impact AnalysisNew Request and New Task

</translate> <translate>

### **TD/OMS More Components view**

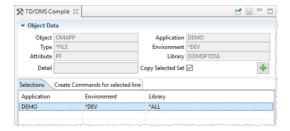
The TD/OMS More Components view offers the same functionality as the TD/OMS components view. Having both views open will simplify some activities

You could for instance specify filtering criteria in the TD/OMS More Components view that are different compared to the filtering criteria of the TD/OMS Component view. This enables you to make the relevant information visible in both views

You can than drag a component from the TD/OMS More Components view to the TD/OMS Components view (or vice versa) and drop it in the other view to specify a user defined relation between two components. <translates The TD/OMS Compile View enables you to overrides creation commands for the selected component. You will see in this section that sometimes we talk about Create and sometimes about Compile, we mean the same thing (strictly speaking, compilation is just one way to create something). Compile overrides are create commands that differ from the normal commands for this specific type. Suppose you want to create all physical files with</p> MAXMBRS(1) except for some special files. We are going to take this example in the following explanation.

# **TD/OMS Compile View**

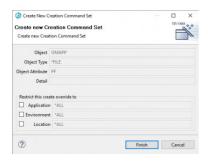
Open the compile view by using the "Show in" context menu on a solution or component. In our case we have selected file OMAPP. The following view is opened:



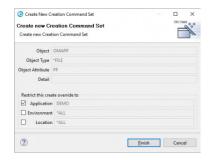
The view shows overrides on the selection tab. In this case, there is already an override for this file when it is created in environment \*DEV in application DEMO. If you click on this line then its create commands are loaded on the tab "Create Commands for Selected Line". Click on this tab to see the create commands for this selected line. If you want to see the default create commands for this object then press CTRL and click on the line again. The will be "unselected" and the second tab will change the contents to "Default Create Commands (not editable)". The default create commands for this component can then be viewed.

## Creating a new Override

Press the big green button to create a new override selection. The "Copy Selected Set" tickbox determines if you want to copy the creation commands for the selected line into the new override. If you untick this box, the default create commands will be copied for this new override.

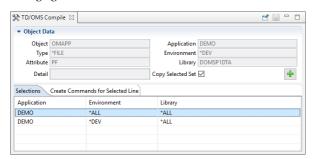


The tick boxes indicate the selection for which this override is active. If you leave all the tick boxes unselected as shown in the previous picture then this override will be active for all occurrences of this file. You can restrict when the override is active by selecting one or more selection boxes.

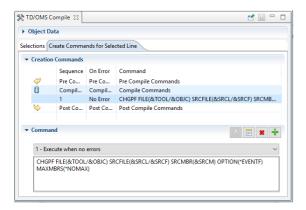


In this case we want to make one additional override to compile the file always with the MAXMBRS(\*NOMAX) setting anywhere in the DEMO application. Tick the Application box as indicated in the above picture. Press the "Finish" button to create the override.

# Changing the creation commands

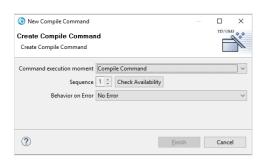


The "Selections" tab will be loaded with our new entry and it will be automatically selected. Selecting a line in the "Selections" tab will load the create commands in the "Create Commands for Selected Line" tab. Click on the tab to reveal the commands. Please note that the "Object Data" section will be collapsed to make more room for the create commands. If you wish, you can expand it manually.



As you can see from the image, there are already compile commands created for this new entry. If you want to remove one of the default commands you can select it and press 🦹 to remove it.

To create a new compile command, select the middle line that says "Compile Commands" and then press the 4- button.



a new wizard will pop up that enables you to create a new command. The command can be created in the "Pre", "Compile" or "Post" section. Since our view is already filled correctly, we just press "Finish". If you get a warning telling you that the sequence is already taken or the Finish button is not enabled, then press the "Check Availability" button to tell you if the sequence is available. Change the sequence if needed. There can only be one compile command, but many pre and post commands.

Also specify the Behavior on Error field to indicate if you want this command to be executed:

#### No Erro

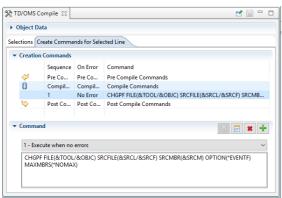
Execute this command if no errors where found in any of the preceding commands.

#### Error

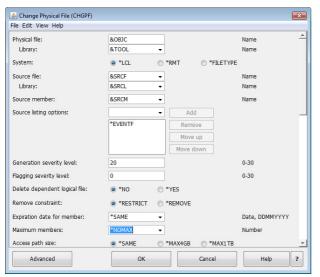
Execute this command errors where found in any of the preceding commands. You can use this field to send a message or do other error recovery.

#### Always

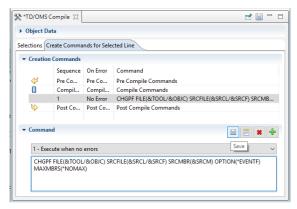
Always execute the command no matter how any of the previous commands ended.



When we return to the Compile view we see that the compile command is copied from the default compile command. All we have to do is to alter our command and we can do that by pressing the "Prompt" (🗐) button.



In the prompt dialog we can change the values that we want and press "Finish" Please note that you can use Substitution variables that will be filled in by TD/OMS.



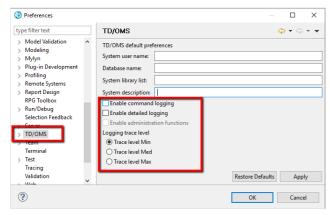
Finally press the "Save" button to save your work.

If you select a solution for Compile, you will see that the new compile command is active, </translate> <translate>

### **TD/OMS** Console view

The TD/OMS Console view shows information when warnings or errors are displayed and when command and/or detailed logging has been activated. The amount of logging information displayed is determined by the selected level. Selection of the Max(imum) level will result in display many details.

The logging level of TD/OMS can be set in the preferences (File/Preferences).

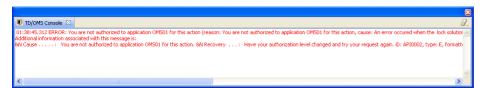


# **Opening the Console View**

To open the console view you can use the quick access button and type TD/OMS Console or use the menu Window/Show View



Performing the same actions with the Min(imum) level selected will only show core debugging information. In most cases only the warning/error is displayed.

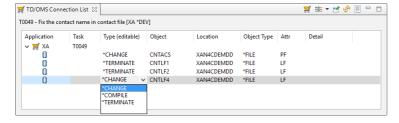


The eraser button in the header of the view enables you to remove the view contents. </translate> <translate>

# **TD/OMS Connection List view**

A Connection List is a kind of shopping-basket: items can be put in or taken out as long as you have not left the shop. The connection list is always used when objects are connected to a task. Even when dragging a component to a task or when you use the "Direct Connect" function, the connection list is used as an intermediate stage.

The Connection List keeps an added component until it is removed or turned into a solution (i.e. connected to a task). The Connection List is especially useful if you are planning a large maintenance task. You can select all components that should be maintained, and later on you can assign the components to the appropriate task(s).

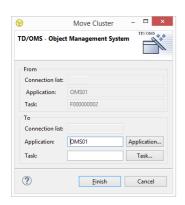


The actions relevant to components can be accessed by right-clicking in the Connection List view. Actions from within this view are:

- Move Cluster/Object
- Delete Cluster/Object
- Process Connection List

#### Moving connection list objects

Objects displayed in the Connection List can be assigned to another Application and/or Task with the Move Cluster and Move Object action.



The Application/Fix selection screen can be displayed by selecting the Application or Task button. The Task in the To connection list group can be left blank to assign the Cluster/Object to a blank Task and avoid that an attempt will be made to connect the object(s) during connection list processing.

#### Changing the Solution Type

You can change the solution type in the view directly. When you click on the type column, the column changes into a drop-down list where the new Solution Type can be selected. The Solution Type can be changed later but this is more involved.

## Changing the column ordering

The columns within the view can be resized and the column order can be changed by dragging the columns into the preferred sequence. You can save this information by pressing the Save the current column ordering

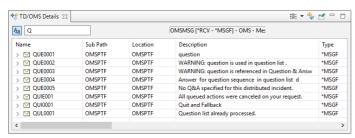
### Processing the connection list

Components that have been added to the TD/OMS Connection List can be processed by pressing the process Connection List button.

Adding and removing components from the Connection List has no effect until the Connection List is processed. </translate><translate>

### TD/OMS Details view

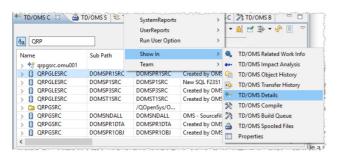
The TD/OMS Details View shows the component elements of the component selected (in the TD/OMS Component view). Only some components (e.g. IBM i source physical files and message files) contain detail information. The contents of the view will be cleared when a component without details is selected.



Elements from this view can be connected to a task, shown in the Graphical Impact Analysis view or the source can be viewed by selecting the appropriate line in the context menu.

### Selecting a Context

The members of a source file or the messages of a message file are show when they are selected in the Components View.

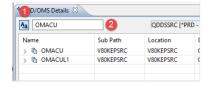


In this view we see that the user has selected a source file and uses the "Show in" menu to open the Details view. Once the Details view is open, you do not have to use "Show in" any more but instead you can just select a source file or a message file in the Components View.

#### Finding Messages or Members

The Quickfilter box (2) enables you to quickly select the item that you are looking for.

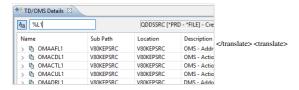
The Quickfilter has two modes which are controlled by the button next (1) to the filter box



When the mode (1) button is pressed then the QuickFilter is in relaxed mode. This is the default. It will not care about the case (e.g. program and PROGRAM will match) AND it will also look in the description. So if you want to find member OMACUL1 which is the "Action clusters" file source then you can either type "action cluster" in the QuickFilter or omacul1 or OMACUL1.

When the button is depressed then the QuickFilter is in strict mode. It will only match on member name and will do so in a case sensitive mode. So if you want to find a member named OMACUL1 then you have to type "OMACUL1" in this exact case.

The Quickfilter box is a "starts with" selection for the object name but it uses an SQL like construct that you can influence by using the percentage sign:

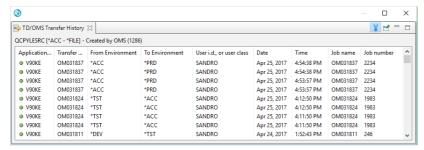


## **TD/OMS History view**

The TD/OMS History view shows the entries that have been registered in the TD/OMS log. TD/OMS log information is created at various moments during the cycle (e.g. during creation of a request and during the transfer process). The view will show relevant information on selection of a Request, Task, Solution or Component.

The main objective of this view is answering the following questions:

- When were activities performed
- Who performed these activities
- · Were the activities completed successfully or not

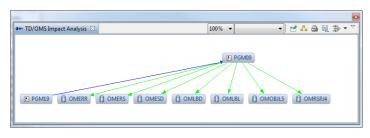


Use the Drill Down action ( $\frac{1}{2}$ ) to find transfers for the selected object in other related applications as well.

A red bullet indicates that 1 or more issues were encountered. The information supplied within this view is not sufficient to determine what the issues were. Other views will supply additional information and some of these views (e.g. TD/OMS Job messages) will react on a selection in the TD/OMS History view. </translate>

## TD/OMS Impact Analysis view

The TD/OMS Impact Analysis view shows a graphical representation of the component selected in the TD/OMS Components view



The lines indicate the type of relation between the components:

- A GREEN line with an arrow pointing away from the selected component represents a *Using* relation.
- A PURPLE line with an arrow pointing away from the selected component represents a *Used by* relation.

The header contains a button to print the information shown or to store it as a image.

## Changing the presentation

Within the impact analysis view there are several methods to influence the presentation of the components. You can:

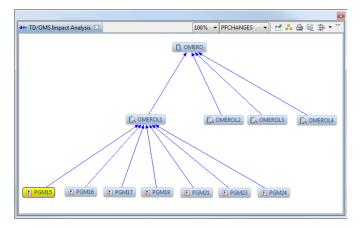
■ Select a different zoom level

The zoom levels are predefined and can be selected by opening the combo box in the header

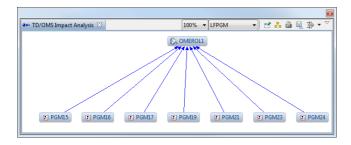
## ■ Select 1 of the available Impact Analysis reports

The Impact Analysis report definitions created in the TD/OMS repository will include/exclude components relevant for the selected type of change. This is a very powerful feature as the type of change has a big impact on the components involved. The maintenance of the Impact Analysis definitions is not part of the GUI. The examples below show the effect of selecting a different report definition.

In case of a PF change:

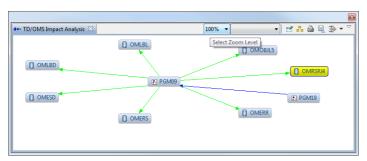


In case of a PGM or LF change:



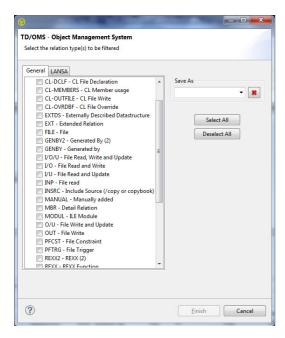
## ■ Change the algorithm used for presenting the information

The menu button offers several algorithms to present the information in different ways.



■ Define a filter

The  $\textit{Define filter} \Rightarrow \text{button}$  in the header will enable specification of various types to limit the components shown.



Enter a name in "Save as" and press Finish to apply the specified criteria

The filter criteria will be removed when the *Delete filter* button is pressed.

■ Enable / disable the display of fields

The menu button also enables you to switch the display of fields on or off

The actions can be accessed by right-clicking on a component in the view. Actions from within this view are:

- New Request and New Task
- Start with ...

Selecting this action will rebuild the view with the selected component as the starting point

■ Select related objects

Select the selected component and all components related to the selected component

- Source view
- Connect

The connect options are only available when a task is selected in the TD/OMS Work Management view.

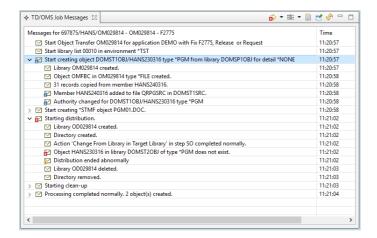
Show History

</translate> <translate>

## TD/OMS Job Messages view

The TD/OMS Job Messages view displays the detail messages of the selected job. A message can be part of a group of messages. Message groups can be expanded and collapsed.

You can populate this view by first opening the "Logged Jobs" or the "Transfer History" views by using the "Show in" menu on a Task or Application. Then select a job or use the "Open Messages" action to populate.



A blank envelope indicates an informational message where a non blank envelope represents a warning or error message. If a severity on a detail group was found then the severity is propagated to the group header. This makes it easy to see where a possible problem can be found.

- Main Informational messages with a severity 0.
- Informational messages with a severity from 1 to 10.
- Warning messages with a severity from 11 to 29.
- Error messages with a severity from 30 and higher
- A problem retrieving the message.

Besides the default buttons, the toolbar contains two interesting buttons.

\* The Next Error button enables you to find the next message with the specified severity. The default severity is set to Error but you can change that to find messages with a lower severity like Warning. Finding the next message can take quite a lot of time in case of large logs. If the next message is not found in the next two seconds then a dialog appears informing you of the progress and enabling you to cancel the search.

Press the drop down arrow to find a menu where you can set the severity you want to search for.

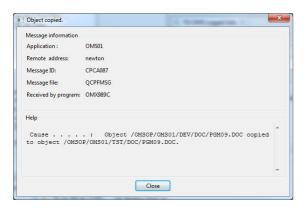


## • The Show list size button enables you to restrict the number of records that gets loaded from the database. Even though the view is a lazy view (i.e. it will only fetch records that you can see), setting the maximum number of records is helpful for quick browsing and jumping between jobs.

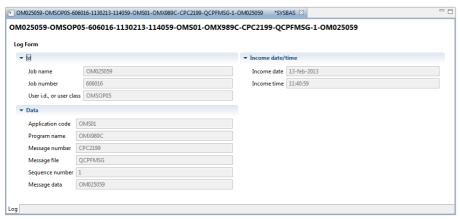
A mini message will appear If the database contains more records then will be fetched. This will tell you that you will not see all records when moving to the bottom of the list.



More information can be obtained by double clicking the message.



And by selecting open from the context menu.



The **Open with default editor** button will open the default editor with the messages contained in it.

```
Start Object Transfer OM025959 for application OMS01 with Fix FIX0002, Release or Request

Start library list 00010 in environment *TST

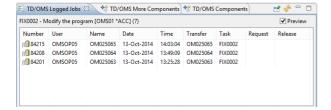
Start creating *STMF object PGM90.DOC.
Library OM025059 created.
Directory COM025059/OMS0P/OMS01/TST/DOC/ created.
Object Copied.
Library OM025059 cleared.
Library OM025059 deleted.
Directory removed.

Start Interny list 00020 in environment *TST

Start creating *STMF object PGM09.DOC.
Library OM025059 created.
Directory (OM025059) created.
Object OMF06 in OM025059 type *FILE created.
Object Copied.
Library OM025059 cleared.
Library OM025059 cleared.
Starting clean-up
Link removed.
Processing completed normally. 2 object(s) created.
Start rebuilding relations !
```

## **TD/OMS Logged Jobs view**

The TD/OMS Logged Jobs view shows the entries that have been registered in the TD/OMS transfer log. The view will show relevant information of Request transfers on selection of a Request and relevant information of Fix transfers on selection of a Task.



More information can be obtained from the TD/OMS Job messages view. This view can be opened/activated by selecting the Open messages action from the context menu.

## TD/OMS Object History view

The TD/OMS Object History view basic objective is to supply information regarding the maintenance history of the selected component or solution. The information can be expanded to access the task related (Solution and Request)

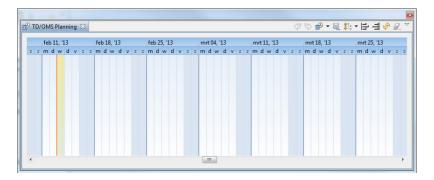


Use the Drill Down action (V) to find history for the selected object in other related applications as well.

The context menu contains the same actions as on the TD/OMS Work Management view for the selected item. </translate> <translate>

## **TD/OMS Planning view**

The TD/OMS Planning View offers you the ability to look at/work with tasks from a planning perspective but showing the take information in a Gantt chart. Today is shown as a red line with a yellow "shadow"



## Populating the Planning View

After you have opened the view, you are able to populate it. You do this by dragging information from the Work Management view into the Planning view. The planning

The following items can be dragged to the planning view:

If a task filter is dropped on the planning view then all tasks (aka fixes) that normally appear under the filter are show in the planning view. In this example you see that there is a filter created for programmer "Ahmed Aadel" which contains five tasks. These tasks would appear in the planning view. You can create all kinds of filters, enabling you to view your planning from different perspectives.

You are able to drag more then one task filter to the planning view

## Change Request Filters

If a request filter is dropped on the planning view then all requests that would appear under the filter are show in the planning view. On top of this, each task that is connected to the change request is shown in the Gantt chart

You are able to drag more then one request filter to the planning view

There is currently an issue rendering the request filters.

## Change Requests

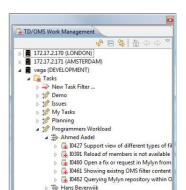
You can also drop one or more change requests onto the planning view. There is currently an issue when more than one request is dropped onto the planning view

## Navigating the Planning View

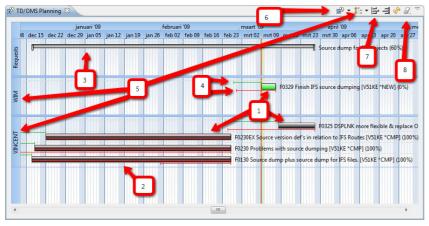
- If you double click the title of the view it will be expanded to occupy the complete GUI window
- To zoom in and out of the planning view click on the view first to active it the press and hold CTRL and use your mouse scroll button to zoom in and out. There are a total of 13 zoom levels.

  Right click your mouse on a blank area in the view to show the zoom context menu.
- Hoover your mouse over a task or request will show a popup window with additional information
   Double clicking an item in the Gantt chart will open that item in the form editor
- Dragging the sides of a tasks bar will change the requested start and completion dates. It will not alter the realized dates.
- Moving a task bar will adjust the expected start and expected end date.

Elements of the Planning View

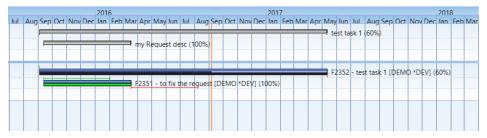


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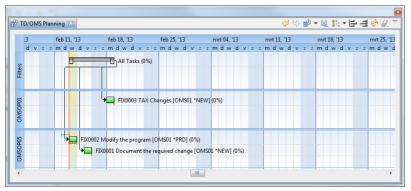


- 1. These are the different task bars. You can drag the complete bar to a new date or change the duration by dragging on the the two ends to resize the task bar. The colors of the bottom part of the task bar vary from deep red (priority 1) to black (priority 9). If a task has no realized end date then it is considered to be under development and the upper part of the task bar it will be painted blue otherwise it will be locked and will have a white color. That way if there are lot of tasks drawn it will be easy to see which ones are done and which are not with a quick look.
- 2. A black stripe in the middle of the bar indicates that the task is completed.
- 3. This container is the change request or the filter and it indicates the total duration of all tasks in that elements range. The left edge is the oldest start date and the right edge is the highest end date.
- 4. If a task is completed the thin green and red lines indicate the planned dates. The task bar indicates the realized start and end dates. If a realized start or a realized end date of a task are not set they will be shown as N/A in the tooltip.
- 5. Indicates the grouping order. The grouping order can be changed. A list of possible grouping criteria will be shown if you press the little arrow on the indicated toolbar button.
- 6. Jumps to various events in the Gantt chart. This is useful if your chart spans a long period of time.
  7. Use these two buttons to show all not started events (planned to start in the passed but that was not realized) and all not yet ended events (planned to end in the passed but have not yet ended) to today. This makes re planning easier.
- 8. The refresh and clear buttons can be used to refresh the view or to clear it. There is one additional item in the view menu that enables you to show lines from the group (request or filter) to the tasks. Please try this.

A completion percentage of the tasks is also calculated and it is refreshed automatically when you change a task on the chart.

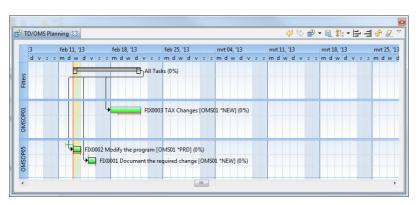


You can use the View Menu button (the triangle button in the header) to activate View scoped lines



A difference between the expected start date and the realized start date is shown by a line connected to the top of the task. A difference between the expected end date and the realized end date is shown by a line that is connected to the bottom of the task. The color (red or green) is used to indicate that the realized date is later than or earlier compared to the expected date. In the example above task FIX0003 has started 2 days before it was expected to start. A task has started when the first solution (component) is moved to the development environment.

The estimated end date can be changed by clicking on the right line of the task box and dragging it to the desired end date. In the example below FIX0003 has be extended to end on February 21.



The estimated start date can be changed by performing the same action on the left line of the task. Both dates will be changes when the task bar is selected and dragged to the desired location.

The buttons in the header enable:

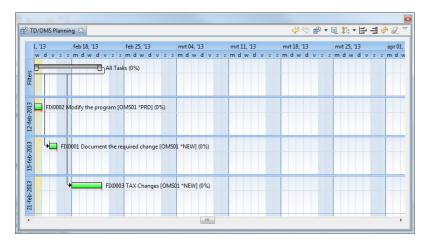
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- Undo and Redo of changes
- Positioning on task with earliest start date
- Positioning on TodayPositioning on task with latest start date
- Saving a graphical image of the planning
   Display of not yet started tasks to start on today
- Display of tasks not ended to end on today
- Refresh and clear of the view

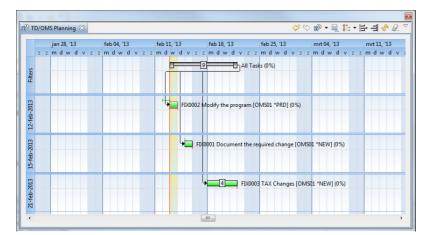
Pressing the Display buttons will not result in a change of the estimated start/end date until you confirm this by slightly moving the task.

You can sort the tasks on a large number of task characteristics by selecting a characteristic in the Show sections menu in the header. The values of the selected characteristic are displayed to the left.

Below an example after selecting the  ${\bf Expected}$   ${\bf Completion}$   ${\bf Date}$  section.



The context menu offers the option to display the number of days in the bar of each open task.



## Special occasions

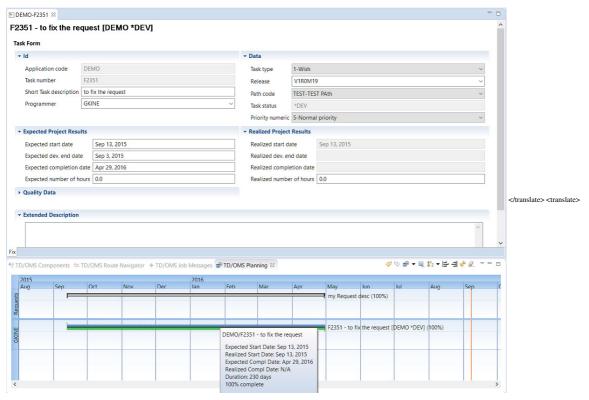
Here we are going to explain the chart's behavior in special occasions. A good example of such an occasion is like the one that follows:

The task duration is calculated from the duration in days from the expected start and end dates if a realized end date is absent. Then this duration is used to estimate the end date starting from the realized start date (if its set and its different than the expected start date, see picture below).

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351 - to fix the re-	quest	[DEMO *DE	/]									
k Form Id					→ Data							
Application code	DEMO				Task type	Task type 1-Wish						~
Task number				Release	Release V1R0M19						~	
Short Task description		ne request	Path code	TEST-TEST PAth					~			
Programmer	ogrammer GKINE V				∨ Task status	*DEV						
					Priority numeric	5-Normal p	riority					~
Expected Project Resul	lts				▼ Realized Project	t Results						
Expected start date	Fe	b 12, 2016			Realized start d	late :	Sep 13, 201	5				
Expected dev. end date	Se	p 3, 2015			Realized dev. er	nd date						
Expected completion of	ate A	ıg 6, 2016			Realized compl	letion date	te					
Expected number of ho	ours 0.0	)			Realized number	er of hours	f hours 0.0					
Extended Description  OMS Components %:		-		2016		Apr	May	tus		<b>□ 1: ▼  = ·</b>		V
Extended Description  //OMS Components &	TD/OM:	S Route Navigator	♦ TD/OMS J	2016	Feb Mar	Apr	May (1994)	lun		□ 1: ▼ = ·	귀 ◈ 월.	V
COMS Components %		-		2016	Feb Mar	Apr uest desc (10)		Jun				\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \
Extended Description  //OMS Components &		-		2016	Feb Mar my Requ	uest desc (10)	0%)		Jul			V
Extended Description  //OMS Components %:		-		2016	Feb Mar my Requ	uest desc (10)	0%)	lun	Jul			\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \
Extended Description  //OMS Components %:		-		2016	Feb Mar my Requ	uest desc (10)	0%)		Jul			\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \
Extended Description  /OMS Components %:		-		2016	Feb Mar my Requ	uest desc (10)	0%)		Jul			~
Extended Description  //OMS Components %:		-		2016	Feb Mar my Requ	uest desc (10)	0%)		Jul			\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \
Quality Data  Extended Description  //OMS Components %  2015  Aug Sep		-		2016	Feb Mar my Requ	uest desc (10)	0%)		Jul			^

In this occasion if the expected end date is moved then the expected start date will take the value of the fixed realized start date. This is because there can't be 2 starting points (expected start and realized start) and I ending point (expected end since the realized end is missing) so the realized start date "wins" over the expected start one for the duration calculation as the following picture shows. Notice that the dates on the tasks description in the upper part of the screen have changed as well (this requires reopening the task).



# TD/OMS Spooled File View

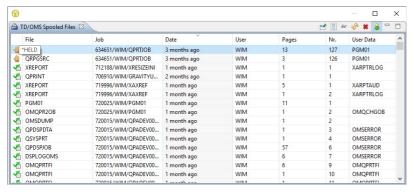
The TD/OMS Spooled File view enables to you quickly view the generated reports on the IBM i that are related to the current selection.

You can open the Spooled File view by:

- $\blacksquare$  Selecting a Task, History record, Transfer record or job message and using the \textit{Show in} .. context menu
- Using the quick-access box in the toolbar and typing spooled file

If it is empty, select a Task in the Work Management view. The view will be populated with all your spooled files for the selected system.

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You can also select a line from the Logged Jobs view, the Build Queue, the Log, the Object and the Task Transfer History views. If you do then the spooled files will be restricted to the ones associated with that specific job (if any).

Use the toolbar (1) to execute action that operate on the queue or entries in the queue

### Pin to the Current Selection

Click this icon to lock the view for further selection changes. When you select another line, the view will not repopulate

### ⊗ Refresh

Refresh the Spooled File List

Save the current column ordering

If you have moved the columns around by using drag and drop, you can use this button to save the ordering for the next time.

### # Delete Selected Spooled Files

All selected entries in the list will be removed from the system. This toolbar entry will only appear if a line is selected.

@ Display the Spooled File

Select one entry from the list and press the Display icon. This will show the contents of the spooled file. You can also double-click the line instead of selecting this icon.

## & Toggle between your files and all files

This action toggles between showing only your files and showing all spooled files in the selection. The default is to only show your files. Please note that the list can become quite long if you select all users in combination with a general selection (like a Task or a Request)

#### The meaning of the line icons

The icon in front of the line (2) will tell you what the state of this entry is. Pressing the refresh 🚱 icon will rebuild the list to show you the latest state of the spooled file queue. Hoover over the icons to get the associates status.

### Other Features

You can click the columns to sort the list on these entries.

## Change and save the view layout

The columns within the view can be resized and the column order can be changed by dragging the columns into the preferred sequence. You can save this information by pressing the Save the current column ordering

## TD/OMS Related Work Info view



The information refers to the lowest task found in case of Component selection and the highest request in case of Application selection. The view can contain multiple tabs. Each tab will contain a \* character until the details of that tab have been displayed.

## TD/OMS Remote Job Monitor view

When you want to see the progress of a deployment or if you want to confirm the failed (4) or pending (2) Tasks you can use this view

The TD/OMS Remote Job Monitor view supplies an overview regarding the status of jobs distributed to Remote systems. The context depends on the selection made in a related view (e.g. the TD/OMS Work Management view or the TD/OMS Logged Jobs view) or on the selection criteria entered in the header of the view. The fact that a regular expression is supported for application and Address means that the information displayed can be tailored to your specific requirements. Examples of regular expressions are:

Shows transfer of application named DEM

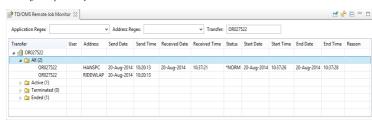
DEM.\*

Shows all applications starting with DEM .\*DEM

Shows all applications ending with DEM (DEM.\*|DOM.\*)

Shows all applications starting with DEM or DOM

More regular expression syntax can be found here.

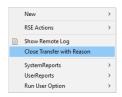


A transfer (job distributed to a remote system) is always part of the All group and will be part of 1 of the other groups based on the status of the transfer:

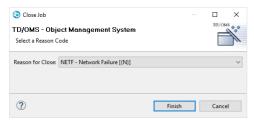
■ Active --> waiting to be run or running

- Terminated --> Completed abnormally
- Ended --> Completed normally

Terminated jobs and Active jobs for which no more information updates are to be expected (eg because of network issues) need to be confirmed. Confirmation is done from the context menu. Right click and select Close.



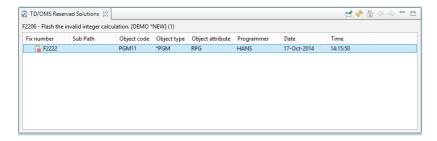
Select the appropriate reason code and press Finish to confirm the remote Job.



The Confirmed by column will be updated with your user id and the End date/Time will be set to the system date/time. </translate> <translate>

### TD/OMS Reserved Solutions view

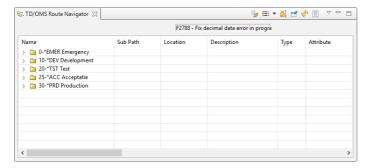
The TD/OMS Reserved Solutions view displays the solutions that have been reserved during the connection process. You need to select an application to update the view



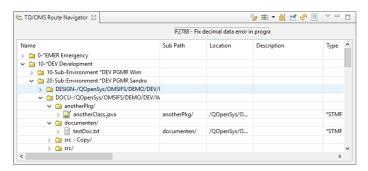
The main purpose of this view (besides viewing the reserved solutions) is to enable removing reserved solutions. This can be achieved by selecting the **Delete** action in the context menu. </translate> <translate> The TD/OMS Route Navigator view shows components that are located in the IBM i Integrated File System (a.k.a. IFS). The following sections describe the view in detail.

## **TD/OMS Route Navigator view**

The TD/OMS Route Navigator view shows components that are located in the IBM i Integrated File System (a.k.a. IFS). Opening the TD/OMS Route Navigator view and selecting an application or a task shows every environment defined within TD/OMS.



An environment can be expanded to show the local sub-environments and every local sub-environment can be expanded to show the defined routes. Expansion is also used to navigate through the files and directories in the route.



 $Right \ click \ on \ the \ Route \ and \ Select \textit{\textbf{Fill Object File}} \ to \ update \ the \ TD/OMS \ component \ repository \ of \ a \ specific \ route.$ 

)	Fill Object Fil	e	
D/OMS - Object I	Management System		TD/OMS
Fields			
Application Code:	DEMO		
Environment Code:	*DEV		~
Route:	DESIGN		٧
Library:	*NONE		~
Object Code:	*ALL		~
Object Type:	*ALL		~
Object Attribute:	*ALL		
Processing Mode  Background II  Processing Method	nteractive		
Filling Emptyi	ng O Report		
Rebuild relations Onl  No Yes	у		
?		<u>F</u> inish	Cancel

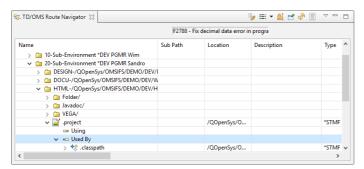
### Exploring route component-relations

The related components can be made visible by pressing the arrow sign (expanding) in front of a component.

Related components are always part of a specific group. The possible groups are:

- Components *Using* the component
- Components Used By the component

When a route component is added to TD/OMS, its relations are NOT built automatically. It is possible to create a user defined relation by dragging a component to another component and dropping it in the *Using* or *Used By* group. Pausing on a group while dragging will automatically expand the group to show its contents. Manual expansion is also possible and can be done indefinitely.



## Including files from related applications

Pressing the *Menu* button will enable you to include/exclude route components of applications for which an interface with the current application has been defined. When including route components from other applications the choice is to display ALL components (Expanded) OR only the components in an application closest to the current application (Collapsed).

## Change and save the route navigator view layout

The columns within the view can be resized and the column order can be changed by dragging the columns into the preferred sequence. You can save this information by pressing the Save the current column ordering

## Processing the connection list

Components that have been added to the TD/OMS Connection List can be processed by pressing the process Connection List button.

The actions relevant to route components can be accessed by right-clicking in the view. The more commonly used actions from within this view are:

- Show information
- Source view
- Checkout to Project (see Checkout (as read-only) to project )
- Show Impact Analysis (when module installed)
- New Request and New Task
- ConnectHistory view

</translate> <translate>

## **TD/OMS** User Options view

The TD/OMS User Options view shows all User Options the user is allowed to see.

 ▼ TD/OMS User Options 
 □ 📑 🍂 🚱 PGM09 [\*PRD - \*ACT - \*PGM] - PROGRAM 9 Option User option description Prm Program/Command Display Message \*LIBL/OMUSROPTGE ES Edit source Programme \*LIBL/OMUSROPTGE Close Request Work spoolfile Manager User OMQCHGRE ACTC(\*COMPLETE) APPL(&REAPPL) REQ(& \*LIBL/OMUSROPTGE WS Work with submitted jobs User \*LIBL/OMUSROPTGE

The following details are shown:

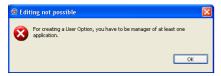
Option	The abbreviation of the User Option					
Aut	The authorisation needed to execute the option					
All	If checked, the User Option runs any selected item. There are more types than the four that can be checked on this page, so checking those four is not the same as checking All					
Obj	If checked, the User Option runs on objects					
Sol	If checked, the User Option runs on solutions					
Fix	If checked, the User Option runs on tasks					
Req	If checked, the User Option runs on requests					
Prm	If checked, a parameter containing information about the selected item will be passed to the program					
(empty)	Shows an IBM i-image if the User Option runs on the server					
(empty)	Shows a PCimage if the User Option runs on the client					
Program/						
Command	The program or command to be run					
Action group code	The (general) group this user option belongs to (if any)					
User option description	A short self explanatory description of the purpose of the user option.					
Restricted to	The user id or user class required to be allowed to use the user option (if any)					

The actions relevant to user options can be accessed by right-clicking in the TD/OMS User Options view. The used actions from within this view are:

- New->User Option
- Change
- Run
- Delete

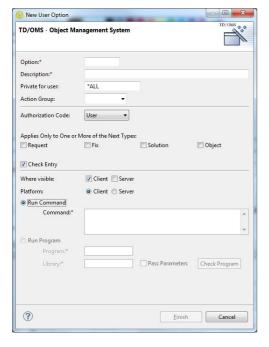
## Creating a User Option

▶ A user can create or change a User Option if (s) he is Application Manager in at least one TD/OMS Application.



The wizard for defining a new User Option can be started by selecting the option New->User Option from the context-menu in one of the TD/OMS views.

At first a screen asking the system will be shown. When the next panel appears, the User Option can be created.



The following values can be set:

## Option

A two-letter abbreviation. Can be upper or lowercase.

Description
A short description

## Private for user

Enter \*ALL or a valid (group) user id for which the user option will be available.

The group that will contain the User Option. Choose an existing group, enter a new one or leave it empty. If you want the group to show in the top level menu, start it with an underscore

The minimum authorisation needed to execute the option. A disabled option runs for nobody.

- Manager
- Programmer
- (Disabled)

Applies...

The User Option only shows up in the context-menu for a selected type(s). If none of the types is selected, the User Option shows up for any type.

Check to indicate that an authorisation check must be performed.

Identify on which platform the option can be used.

#### Platfori

Choose where the User Option should run: on the client or on the server. The client only runs commands. The server runs both commands and programs.

#### Comman

The command to be run. The command is platform-specific. On the server, the CL-language should be used. When using the prompt characters "?" in front of the command the command will also be prompted in the GUI.

 $The program to be called. It is possible to specify *LIBL for the library. Press the {\bf Check Program} \ button to find out if the program can be run.$ 

#### Pass parameter

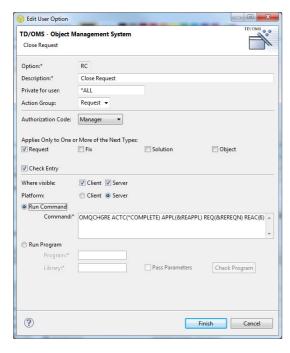
If checked, a parameter containing information about the selected item will be passed to the program when the User Option is executed. Source file QUSRSRC in your TD/OMS library contains examples of programs that process User Options

#### Check Program

Pressing this button will perform a check on the existence of the program in the specified library. The header will contain an informational message when the check is passed and a warning message when the check has failed.

## **Changing a User Option**

A user option can be changed by selecting the Change action from the context menu of the TD/OMS User Options view. The user option definition screen will be displayed.

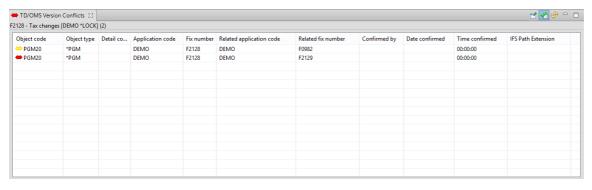


The rules that are applicable during creating of a user option also apply during changing a user option for the values that can be set. </translate><translate>

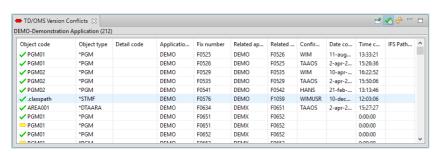
## **TD/OMS Version Conflicts view**

You might want to read up on Object Version Concepts.

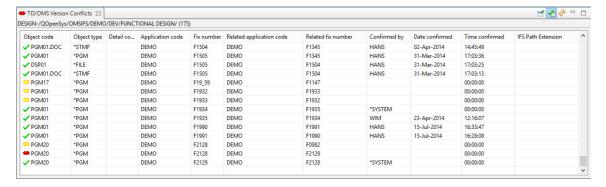
The TD/OMS Version Conflicts view shows solutions with a (possible) version conflict for the selected Component, Solution, Task, Request or Application



The view shows version conflicts for objects in the selected application AND for objects in the related application(s) as shown in the next example:



By default the view only shows the conflicts that must be confirmed. Press the **Show All** button ('checked'-icon) in the upper right corner of the view to include conflicts that are confirmed by is filled in) and the potential version conflicts.



TD/OMS recognizes two types of version conflicts:

- Conflicts that MUST be confirmed (red arrow)
- Potential version conflicts (vellow arrow)

Potential version conflicts occur when a solution is connected to more than 1 task but the component in the production environment has the highest version number. This will be the case when you connect a component to multiple tasks without performing a copy transfer for (all of) these solutions.

Depending on the actions taken a possible version conflict may turn into a real conflict that must be confirmed. Possible conflicts that do NOT turn into a real conflict will be automatically confirmed. These conflicts show \*SYSTEM in Confirmed by, </rranslate> </rranslate> </rranslate> </rranslate> </rranslate>

# The Mylyn interface

<translate>

## The basic idea

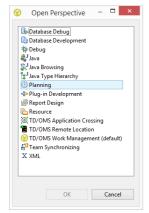
The TD/OMS software offers functions to manage native IBM i objects (stored in libraries), Documents (stored in document folders) and other objects (stored on the IFS in the (QOpenSys) folder structure). The Documents are supported for backward compatibility.

TD/OMS will transfer the non IBM i objects to a specific folder based on the definitions made by the application owner. These definitions have to be generated first. Within TD/OMS these definitions are known as Routes. Routes are registered on a sub-environment level and each sub-environment can contain multiple routes. During the transfer the process will use the route stored with the solution to transfer the object from the current location to the location registered for the same route code in the selected target sub environment(s). </translate>

## The Mylyn perspective and its views

A perspective is available containing the relevant views. Select "Open Perspective" (from the Window menu or by clicking the button), select "Other" and choose the Planning perspective.

[1] (http://remainsoftware.com/profiles/remainsoftware/themes/delta/images/remainsoftware-logo.png)



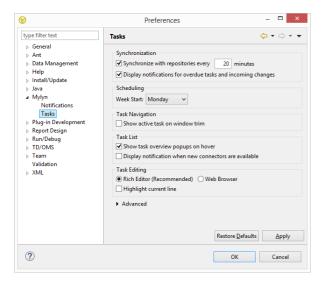
This perspective contains several views. Which views are displayed depends upon the saved (default) configuration of the selected perspective.

## Set-up activities

Usage of the Mylyn interface requires some set-up on the client before it will work.

## 1 Setting the Mylyn preferences

 $The \ preferences \ (use \ window \ / \ preferences \ to \ access) \ contain \ a \ separate \ node \ related \ to \ Mylyn. \ Expand \ this \ node \ and \ Select \ Tasks.$ 



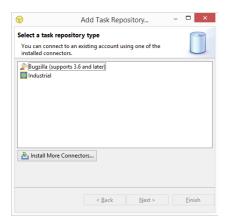
The default for automatic synchronization is every 20 minutes. The number of times that synchronization takes places can be increased by entering a lower value or automatic synchronization can be de-activated by removing the

## 2 Adding a task repository

The Task Repositories view always contains a Local Task Repository. This enables you to create tasks within your own workspace.

TD/OMS will automatically create a Task Repository when a TD/OMS Request or TD/OMS Task is accessed with the "Open with Mylyn Task Editor" option on the context menu and the required Task Repository definition is not found. In some situations you may want to manually create (or modify) the Task Repository definition.

Click the [f] (Add Task Repository) button shown in the Task Repository view.



Select the Industrial Task Repository type and the Next button.



To connect to the IBM i the Server field must be:

Jdbc:as400://myhost/mylibrary

You must replace myhost with the name of your IBM i and mylibrary with the TD/OMS library name. Mylyn expects that the server field contains a unique string. An additional connection to the same server can be achieved by using a different alias for the host name.

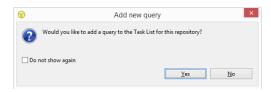
The Label is a descriptive name of the Task Repository connection.

Uncheck the "Anonymous Access" check box and fill in the User ID/Password.

Open the "Additional Settings" section to select the Request Repository and SQL mapping configuration when required. Please be aware that the Server value may be reset if you make a change in the Additional Settings

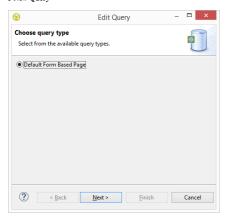
9		_ 🗆 ×					
Industrial	ndustrial Repository Settings						
<ol> <li>Authent</li> </ol>	ication credentials	are valid.					
Server:	jdbc:as400://newt	<b>~</b>					
Label:	Training Requests		Disconnected				
User ID:	OMSOP05	Anonymous					
Password:	******		Save Password				
▼ Addition	nal Settings						
Choose	a Repository	OMS Request	~				
Choose	an SQLMap config	OMS Request	~				
<u>V</u> alida		< <u>B</u> ack <u>N</u> ext >	<u>F</u> inish Cancel				

It is advised to validate the settings before pressing the Finish button. Press  ${\bf Finish}$  to save your settings.



Select Yes to create a New Query or select no if you do not want to create a query (yet). You can also create a Query by selecting and New Query... from the context menu on the selected Task repository.

#### 3 New Oner



Only 1 Repository type is available and already selected. Press Next.

<b>②</b>	Ec	dit Query				×		
	Form Based Query Create a Query based on existing values in the Database							
Query Title:  Summary  Description  Comments								
Products DEMO OMS01	Owners OMSOP01 OMSOP05	Status  *ACC *CMF *DEV *LOC *NEW *PLN	K	•	Priority P1 P3 P4 P5 P9			
Creation Date	before:	22/10/2014	■-	After:	22/10/2014	-		
Development	End Date before	22/10/2014	-	After:	22/10/2014	-		
Completion D	ate before	22/10/2014	-	After:	22/10/2014	-		
		Upo	date At	tribute	s from Repo	sitory		
<u>?</u> ⟨ <u>B</u> a	ck <u>N</u> ext	t>	<u>F</u> inis	sh	Cane	cel		

The Query Title must be entered and should be a clear description of the defined query.

Entering a value in the Summary field will result in exclusion of the Requests/Tasks that do not have the exact string somewhere in the (short) description.

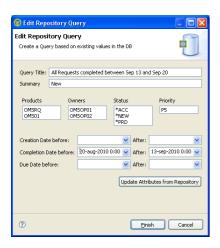
The Repository is queried and the information found is displayed.

The following Mylyn to TD/OMS mapping is done:

- Product > Application
- Owner > Reported by/Programmer
   Status > Status
- Priority > Priority

Mylyn only supports 5 different priority codes whereas TD/OMS supports many more. The mapping process will group TD/OMS numeric priorities (e.g TD/OMS priority 8 and 9 are both P5).

Special attention must be given when entering the dates. The get the information for a specific period the later date must be entered in the first column.



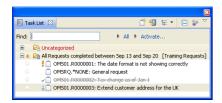
Selections will reduce the set of tasks retrieved. The attributes shown are determined when the query is created. The update attributes button will retrieve the currently available values and remove previous selections.

### Task List activities

The Repository Query definitions can be found in the Task List view



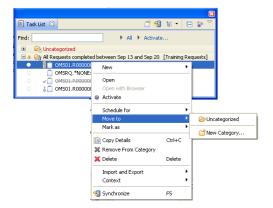
The tasks will become visible by pressing the + character in front of the definition



The priority is indicated in front of of the task:

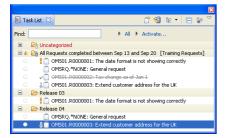


Tasks can be assigned to a category by selecting it from the context menu. This is also the place to create a new category.

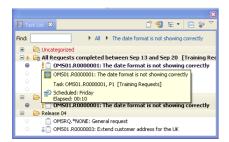


The intention is to create categories that represent your development driver such as releases.

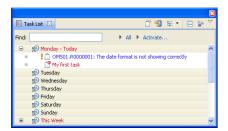
7/3/17, 2:14 PM 53 of 91



You can register the time spend on a task by activating a task (Activate from the context menu, via the Activate button in the sub header or by clicking the transparent dot in front of the task). You can stop the time registration by deactivating the task (Deactivate from the context menu, by selecting deactivate in the pull down menu in the sub header or by clicking the dot in front of the task). The elapsed time is shown when you hoover over the task.

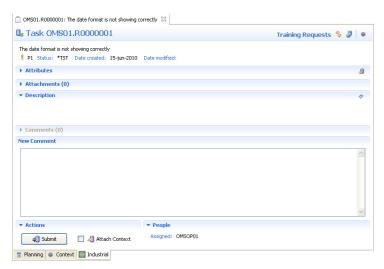


Tasks can be shown by category or according to the schedule. You can toggle between these ways of presentation by clicking the Task Presentation  $\sqsubseteq$  button in the header.



A red line indicates that 1 or more items are overdue

The Task can be opened in the editor pane by double clicking on it. The industrial tab is the first one to be displayed.



The attributes section contains priority, status and date information.

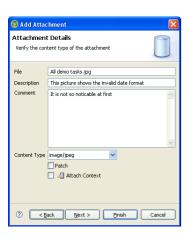
The attachment section enables you to add attachments to the task from various locations. Press Attach...

Note: In order for attachements and discussions to work please journal the following files:

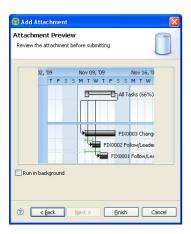
OMANYR
OMANYT
OMANYT
CONTECC
CONTAC



Pressing Next will allow you to enter some additional information.



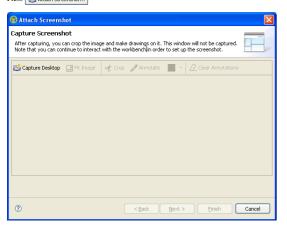
Presing Next again will show a preview of the attachment (when applicable).



Pressing Finish will store the attachment with the task.

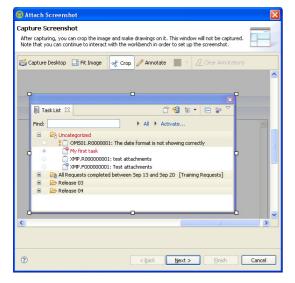
Besides adding a attachment from a File, Clipboard or workspace location an attachment can also created based on, a part of the screen currently shown.

Press Attach Screenshot...



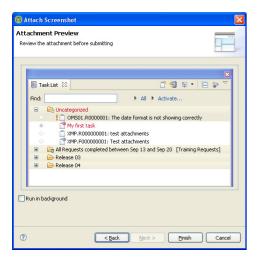
The instruction in the header is self explanatory.

- Make sure that the information you want to capture is shown on the screen ans select the Capture Desktop button.
- Use Fit Image to select the entire screen.
- Use Crop and select the desired portion of the screen when you do not want the entire screen



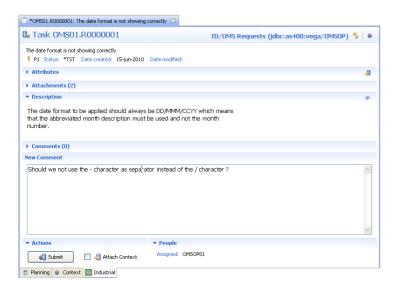
Pressing Next will allow you to enter some additional information

Presing Next again will show a preview of the attachment (when applicable).



Pressing Finish will store the attachment with the task.

The New Comment field in the Comments area enables you to add comments to the Request/Task.



Press 4 Submit to add the comment. You (or someone else) can include the comment text in your reply by clicking the reply 40 button behind the comment.



## Mylyn Integration with TD/OMS

#### How to Use

Converting a whole TD/OMS filtered task or request list into Mylyn list with one click.



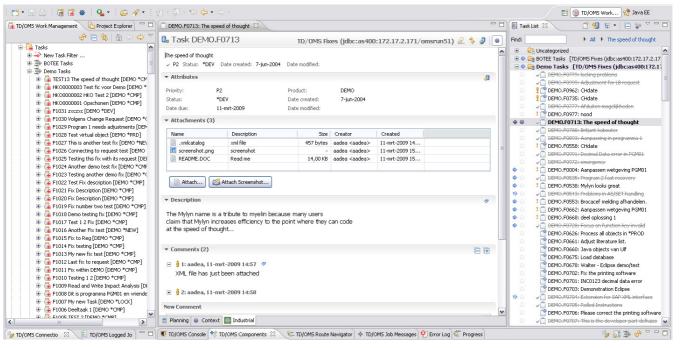
Making a new Mylyn query from within TD/OMS.



Opening a TD/OMS task or request in Mylyn rich editor



TD/OMS will present the information in the following way.



## Issues

 $Please\ report\ related\ problems\ to: \textbf{helpdesk@remainsoftware.com}\ <\!\!\text{translate}\!\!>\!\!<\!\!\text{translate}\!\!>\!\!<\!\!$ 

## More About Mylyn

Mylyn Philosophy in a Nutshell

Mylyn a sophisticated mechanism for keeping track of tasks. A task is any unit of work that you want to recall or share with others, such as a user-reported bug or a note to yourself about improving a feature. In TD/OMS case a task is a Fix or Request. To connect to a particular task repository, you must have also installed a Mylyn connector for that repository. Mylyn is integrated with TD/OMS using Industrial Connector (http://wiki.eclipse.org/Mylyn/Incubator/Generic\_Industrial\_Connector).

Once your tasks are integrated, Mylyn monitors your work activity on those tasks to identify information relevant to the task at hand. From this, Mylyn creates a task context — the set of all artifacts related to your task. These can include documents you've browsed, methods you've edited, and APIs you've referred to. Mylyn uses the task context to focus the UI on interesting information, hide what's uninteresting, and automatically find what's related. Having the information you need to get your work done at your fingertips improves your productivity by reducing the time you spend searching, scrolling, and navigating. By making task context explicit, Mylyn also helps with multitasking, planning, reusing past efforts, and sharing expertise.

Over time, the result of using Mylyn is a subtle but fundamental shift in the way you work. Once you become accustomed to working in a task-focused way, you're likely to notice a dramatic increase in your productivity. Being organized, staying on top of dozens of collaborative tasks, and tracking your progress will gradually become effortless.

More info

 $Interesting \ Mylyn \ Presentation \ by \ Mik \ Kersten. \ Mylyn \ project \ lead. \ (http://www.tasktop.com/videos/mylyn/webcast-mylyn-3.0.html)$ 

Mylyn tutorial by Mik Kersten (http://www.ibm.com/developerworks/java/library/i-mylyn1/)

Mylyn Visual tutorial (http://www.eclipse.org/mylyn/new/)

Mylyn User Guide (http://wiki.eclipse.org/index.php/Mylyn\_User\_Guide)

## Mylyn Installation

Note: Mylyn requires Java 5 or later. It will not work, and will complain on startup, if you try to run it with JRE 1.4 or earlier.

For seamless integration with TD/OMS, it's advised to use Mylyn 3.0.2 or later. You can download Mylyn from: Mylyn download page (http://www.eclipse.org/mylyn/downloads/)

Please do install Mylyn before we can go further integrating it with TD/OMS: Mylyn installation steps (http://www.ibm.com/developerworks/java/library/j-mylyn1/#N10136) </translate> </translate> translate>

# Non IBM i objects

<translate>

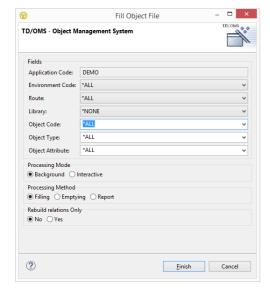
#### The basic idea

The TD/OMS software offers functions to manage native IBM i objects (stored in libraries), Documents (stored in document folders) and other objects (stored on the IFS in the (QOpenSys) folder structure). The Documents are supported for backward compatibility.

TD/OMS will transfer the non IBM i objects to a specific folder based on the definitions made by the application owner. These definitions have to be generated first. Within TD/OMS these definitions are known as Routes. Routes are registered on a sub-environment level and each sub-environment can contain multiple routes. During the transfer the process will use the route stored with the solution to transfer the object from the current location to the location registered for the same route code in the selected target sub environment(s). </translate>

## How to tell TD/OMS about these objects

You can make the objects already stored in the defined routes known within your application by running the Fill Object File function. Change the default Route value (\*NONE) by selecting a specific route or the special value \*ALL to activate this feature.



You can use this method to make new objects available within TD/OMS after you have moved them to the correct location but this means that:

- You must have access to the IFS
- You must know the exact location to store the objects

To avoid these knowledge requirements and manual actions several interfaces have been generated to import objects into TD/OMS and to export objects from TD/OMS to another (version) management system. An example of an interface that is available as a separate module is the Subversion to TD/OMS interface which enables the user to connect an object to a TD/OMS task by selecting the task and route. Another example is the Checkout/Checkin of an object to a Eclipse Project. This interface is available in all TD/OMS GUI installations and will be discussed in more detail. </translate> <translate>

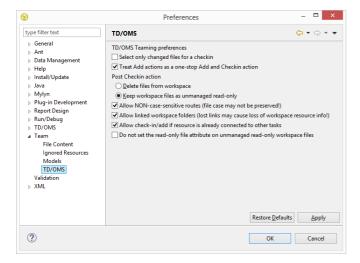
# TD/OMS and the eclipse teaming interface

## Set-up activities

Usage of the TD/OMS teaming interface requires some set-up on the client before it will work

# Teaming preferences for TD/OMS

The preferences (use window/preferences to access) contain a separate node related to Teaming. Within this node a TD/OMS sub node exists to enable configuration of the TD/OMS specific settings.



#### Select only changed files for a checkin

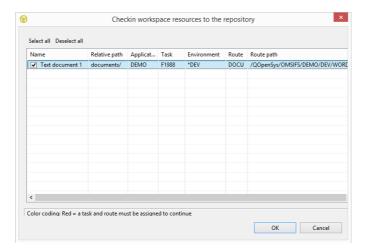
Activating this option will limit the objects that can be checked back in to the related task to those objects that have been changed.

Objects that meet these requirements are represented by the 🔓 icon. Checked out objects which are in sync with the TD/OMS repository are represented by the 🔝 icon.

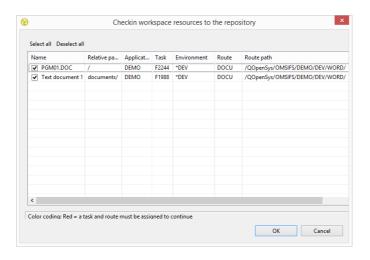
For this project:



Performing a Checkin to task with this option activated would result in:



Performing a Checkin to task with this option de-activated would result in:



Treat Add actions as one-stop Add and Checkin action

The Add to task will be automatically followed by a Checkin to task when this preference is checked. It may be a good idea to check this preference when you normally wait with adding your resources to TD/OMS until you have completed development.

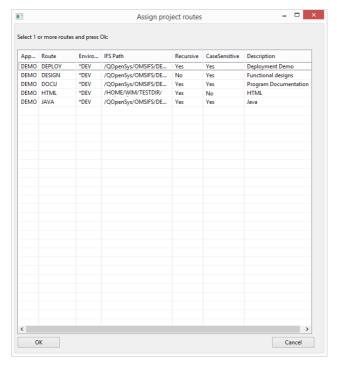
#### Post Checkin action

This preference determines what is done with the resource after it has been checked in to the task. Selecting *Delete files from workspace* will remove the resource. Selecting *Keep workspace file as unmanaged read-only* will not remove the resource. The icon in front of the resource name will change into into the Text document 1 resource mentioned above and Keep selected would result in:



## Allow NON case sensitive routes

Activating this preference will make it possible to select Non case sensitive routes while adding routes to a project.



Only routes that have QOpenSys as the first folder will be case sensitive.

## Allow linked workspace folders

Activating this preference will make it possible to create folders within a project that link to a folder in the file system (e.g. a shared folder on the IBM i). Usage of linked folders is not recommended as availability of resources can not be checked/controlled by teaming in the same manner as can be done for non linked workspace folders.

# Allow check-in/add if resource is connected to other tasks

Activating this preference will make it possible to check-in/add a component to a task while (another version of) the component is connected to 1 or more open tasks. TD/OMS will enforce the standard solution conflict rules:

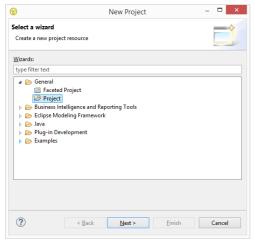
- 1. Connect as leader and make other occurrence a follower when in same location
- Lock other occurrence when location differs.

## Do not set the read-only file attribute on unmanaged read-only workspace files

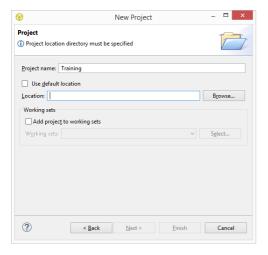
Activating this preference will avoid that the read-only attribute is set for files that are left behind. In some situations setting the read-only attribute may cause problems for other products that try to access the file.

## Project definition

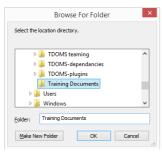
- Create a new project
  - Select File, New, Project
  - Select Project from the general Tab and press next

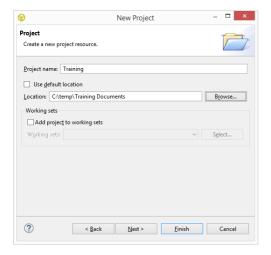


■ Give the "Project" a useful name and de-select the Use default location checkbox



■ Enter (or use the Browse button to select) the location (use the Make new folder button during the Browse when applicable).



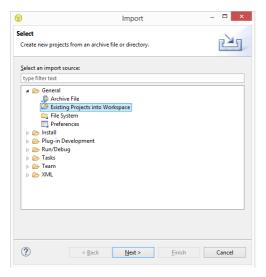


■ Press Finish to create the project

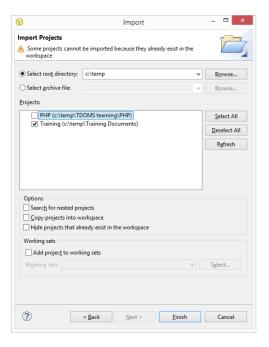
## Import an existing project

You can import project information that has been created with another installation by selecting import from the File menu. This will be the case when you are sharing the same (network) location.

Open the General tab and select Existing Projects into Workspace.



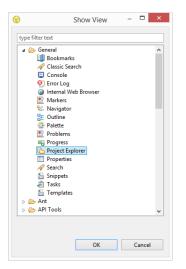
After pressing the Next button you can enter the (network) path to the existing project (or select it after pressing the Browse button).

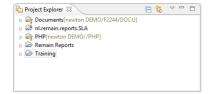


The project(s) are added to your workspace when the  $\pmb{Finish}$  button is pressed.

## Show the project

Use Window, show view, other to open the Project Explorer view from the General Tab and put the view next to the TD/OMS Work Management view.

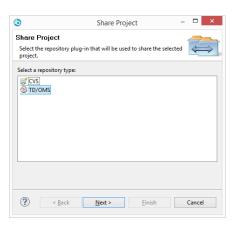




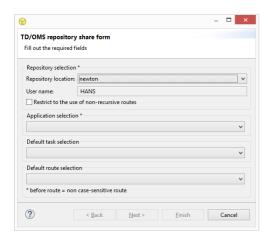
The folder this project is pointing to contains a document called .project. This document must not be deleted as it contains the project information.

## Share the project

Select Team, Share project from the context menu of the project folder (in this case Training). When more than 1 sharing possibilities exist the selection screen will be displayed.

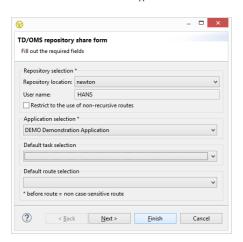


Select TD/OMS and press Next

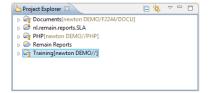


Select the defined Repository location (Remote system/Host) and Application (You must first select the remote system before you can select an application).

The Restrict to the use of non-recursive routes. Any folders created within the project must have a name identical to a non-recursive route name of the related application.

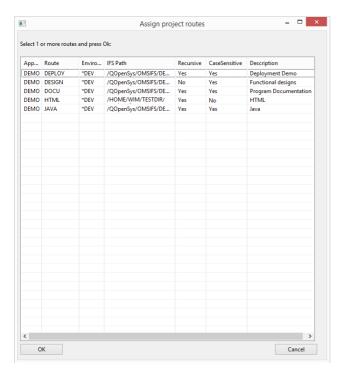


You can also select a default task and route and/or press next to add additional tasks/routes but this is optional. Press Finish. The folder icon has changed to indicate that the project is shared.



## Add route(s) to project

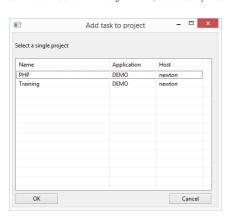
Select Team, Add routes from the context menu of the project folder. The program will determine the routes that are not known to the project (yet).



Select the Route(s) to add and press OK. This step can be avoided by selecting a default route in the previous step but has been added to show that maintenance functions can be reached by selecting Team in the context menu of the project folder.

## Add task(s) to project

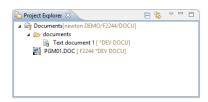
Switch to the TD/OMS Work Management view, select the task you want to add to the Project and select Add task to Project from the context menu.



Select the project to which you want to add the task to and press the OK button.

## How to create project folders

You can create a folder structure in the project folder (by selecting New, Folder from the context menu). This enables you to put your objects where preferred but requires that you use recursive TD/OMS routes.



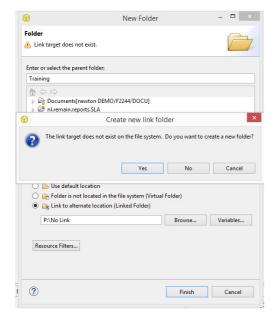
The New Folder interface enables creating 2 types of folders:

- new (physical) folders below the path linked to by the Project
- folders that link to a folder in the file system

Creating a linked folder is only possible when Allow linked workspace folders in the Team TD/OMS preferences has been activated. This option is de-activated by default. When de-activated a message will be shown in the header of the create folder view on selection of the Link to folder in the file system checkbox.

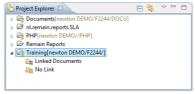


It is possible to specify a path to a location that does not exist (yet). You will be asked if the folder should be created or not.



Press No if you do not want (or are not authorised to) create the folder.

If the folder was created by pressing Yes or by adding an existing folder, the linked folder icon (@) is displayed. The folder icon will contain an exclamation mark (@) when the link failed (as shown for the no link folder in the picture below).



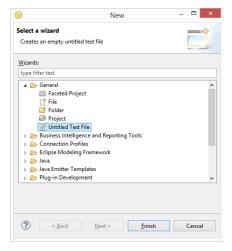
When working with linked folders you should always guarantee that the linked folder can be accessed before you start working with the objects in the project (e.g. you may have to log in on the server to achieve this).

You can use any application to generate/maintain the objects in the project folder (structure). Depending on the Route definition made by the application manager TD/OMS will remember the folder structure.

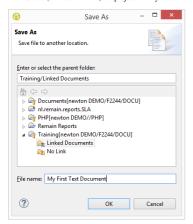
## How to create/connect a document

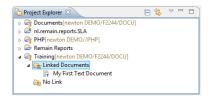
A simple text document can be generated by performing the following steps:

■ Use File, New, Other and select the Untitled text file from the General tab.

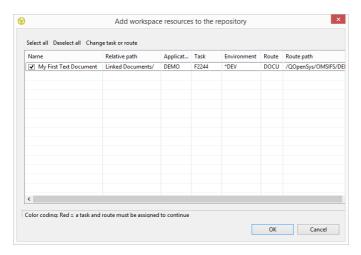


- Press Finish to open the editor.
   Enter some text and Close (or Save) the document.
- Select (the folder within) the project when you want to store the document and enter a valid name for the document

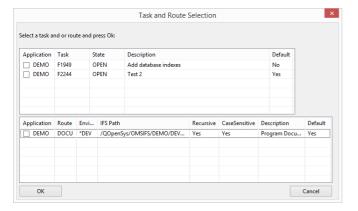




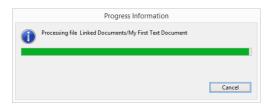
Select Team, 🏲 Add to task from the context menu to add a new component. This action applies to the objects/folders selected.



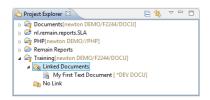
The task/route can be changed by double clicking an object or by clicking the Change task or route button after selecting 1 or more objects.



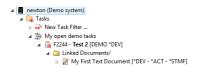
Press OK (twice) to start the process



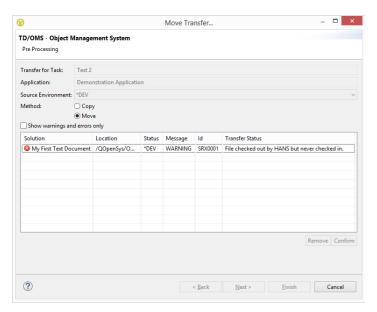
The document icon will change to indicate that the object has been connected.



The document has been transferred to the IFS, connected and checked in (if specified in the Teaming preferences) to the task as shown in the TD/OMS work management view.



An arrow in the icon indicates that the object has not been (automatically) checked in. Running a transfer will fail as the object has to be checked in first.



You may be able to select the component and press Confirm.

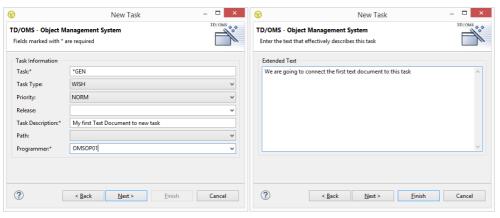
## How to quickly connect a document to a new task

In some situations you may want to connect 1 or more documents to a new TD/OMS task. To achieve this with the option explained earlier you would have to:

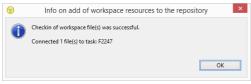
- Create a new TD/OMS task
- Assign the task to the teaming project
   Add the documents to the task
- Check in the documents to the task (preference enable to do this automatically as part of the previous step)

Instead of performing these steps separately you can select Team, 🚜 Create a new default Task and Checkin ... from the context menu to do this i1 step. This action applies to the objects/folders selected.

Fill in the required fields in the New Task wizard:

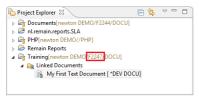


After pressing the Finish button the progress bar will be displayed briefly. When completed the info screen is shown



Click OK to close the screen.

The new task has been assigned to the Teaming project as the default task.



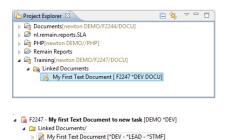
The new task will also appear in the TD/OMS work management tree with the document(s) connected.

```
△ 🖟 F2247 - My first Text Document to new task [DEMO *DEV]
  ▲ Test 2 [DEMO *DEV]
  ▲ 🗀 Linked Docum
    My First Text Document [*DEV - *FOLLOW - *STMF]
```

The default solution conflict handling will be applied during the connect process. This means that the status will show as \*ACT for the solution of the new task when a document is not active on another task or when the solution of the other task is not in the same location (in which case the status of the solution on the other task will show as \*LEAD for the solution of the new task when it replaces a solution in the same location (in which case the status of the solution on the other task will show \*FOLLOW).

## Checkin/Check out activities

Select Team, Checkin to task from the context menu of the object in the Project Explorer view. This will transfer the object, remove it from the project (depending on the teaming preferences) and change the icon in the TD/OMS



Checkout (as read-only) to project

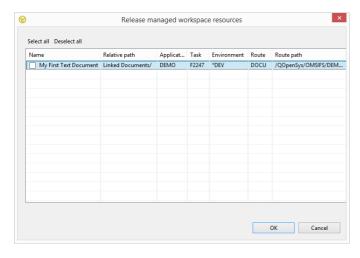
7/3/17, 2:14 PM 68 of 91

An object can be transferred to a defined project by selecting the Checkout to project on the context menu of a solution in the TD/OMS work management view. This will flag the object as checked out (indicated by the arrow in the icon) and will make the object available in the project in the navigator view.



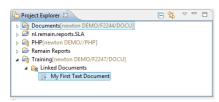
The Checkout as read only to project option on the context menu of a solution in the TD/OMS work management view will also place the object in the project but with a different icon () to indicate that the object is managed but not locked

You can remove the check out/managed object indication by selecting Team, Release managed files in the context menu of the object in the project Explorer view. You must explicitly select the object(s) to be released. All objects can be (de-)selected by pressing the related button in the header.

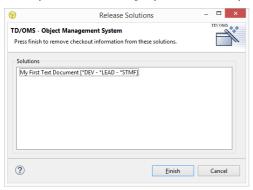


The selected objects will be processed by pressing the OK button. This will change the icon shown in the TD/OMS work management view (when applicable) and will leave the object in the navigator view showing a question mark in the icon.

☐ F2247 - My first Text Document to new task [DEMO \*DEV]
☐ Linked Documents/
☐ My First Text Document (\*DEV - \*LEAD - \*STMF]



Another way to remove the check out/managed object indication is available by selecting Release managed files in the context menu of the solution in the TD/OMS Work Management view. You must



Click **Finish** to achieve the same situation as shown above.

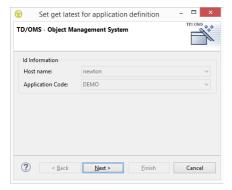
## Import related activities

Several options are available to support the batch retrieval/update of TD/OMS managed non IBM i objects and store these within a defined project. Most of these options are part of the Team sub-menu within the context menu. Some of these Team sub-menu options are only available on project level and some are available on other levels as well. The options involved are:

■ Set get Latest Definition

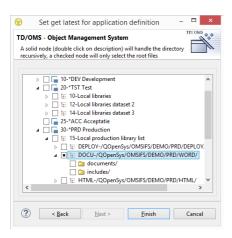
This project level option is used to define which IFS trees must be read during the retrieval process. This definition has to be performed before the retrieval can take place.

Selection of this context menu option will start the wizard.



The screen shows the Host and application related to the project.

Pressing next> will show the application environment/sub environment definition. You can expand the environments and sub-environments to show the underlying routes

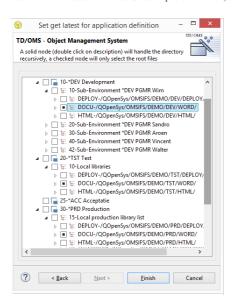


Clicking inside a check box in front of a route will put a check mark (📝) to indicate that only objects in the location shown are taken into account.

Double clicking the route will change the check box into a solid node (🔳 ) to indicate that objects in the location shown and in locations below the location shown are taken into account

The retrieval process will start with the selected routes in the environment with the lowest number and will end with retrieving objects from selected routes in the environment with the highest number. Depending on your requirements you can (re-) generate the desired project content by making different route selections.

The picture shown above will retrieve only objects from the production environment whereas the picture below will retrieve the objects from all environments (in which objects from the production environment are replaced with the version found in the test environment and/or development environment).



Pressing Finish will store the definition (as teaming.rgdlx) in the root of the project.

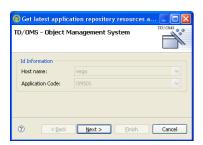
■ Get latest from repository

Get latest from repository

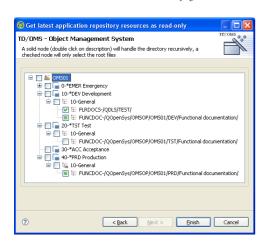
This context menu option will retrieve the objects from the defined locations and store these objects as read only in the project (objects already in the project are replaced with the version from the lowest environment when checked out as read only and skipped when checked out).

The screen shows the Host and application related to the project.

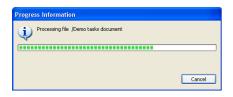
7/3/17, 2:14 PM



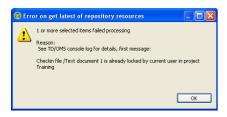
Pressing next> will show the application environment/sub environment definition. The environments in which 1 or more routes have been selected during the definition are expanded automatically. You can expand the remaining environments and sub-environments to show the underlying routes.



Pressing Finish will start the retrieval process based on the (modified) definition

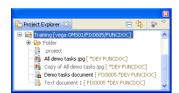


During the process 1 or more warning/error situations can be detected. These situations will prevent retrieving the latest version of the object. At the end of the process a message will be displayed showing the first error/warning. In case of multiple errors/warnings the message will also refer to the fact that the messages are stored in the TD/OMS console view.

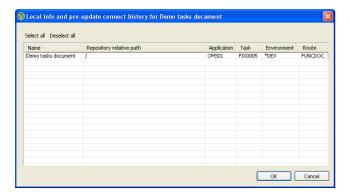




The environment and route is displayed for each retrieved object.



The option  $\stackrel{\ \, \scriptscriptstyle\frown}{\stackrel{\ \, }}{\stackrel{\ \, \scriptscriptstyle\frown}{\stackrel{\ \, \scriptscriptstyle\frown}}{\stackrel{\ \, }{\stackrel\rightarrow}}}}}}}}}}}}}}}$ 



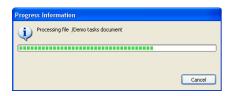
■ Replace read-only with latest

Replace read-only with latest

This context menu option will retrieve the objects from the defined locations and store these objects as read only in the project. This function will replace objects that are already known within the project as read only (an object with the same name must exist but without the read only indication will not be replaced) and will not add objects unknown within the project. At least 1 object must exist with a read only indication for this option to be available.

Read only objects will be removed from the project when they are (no longer) part of the definition scope (the definition has been changed or the object is not found any more).

Selection of the context menu option will start the retrieval process based on the definition created earlier.



During the process 1 or more warning/error situations can be detected. At the end of the process a message will be displayed showing the first error/warning. In case of multiple errors/warnings the message will also refer to the fact that the messages are stored in the TD/OMS console view.

The environment and route are updated for each retrieved object in the project.



■ Update read-only fromm latest

€ Update read-only from latest

This context menu option will retrieve the objects from the defined locations and store these objects as read only in the project. This function will replace objects that are already known within the project (an object with the same name but without the read only indication will also be replaced) and add objects unknown within the project. At least 1 object must exist with a read only indication for this option to be available.

Read only objects will be removed from the project when they are (no longer) part of the definition scope (the definition has been changed or the object is not found any more).

Selection of the context menu option will start the retrieval process based on the definition created earlier.



During the process 1 or more warning/error situations can be detected. At the end of the process a message will be displayed showing the first error/warning. In case of multiple errors/warnings the message will also refer to the fact that the messages are stored in the TD/OMS console view.

The environment and route are updated for each retrieved object in the project.



The teaming options related to batch retrieval create or depend on the teaming.rgdlx file which is stored in the root of the project. It is also possible to perform a even more advanced import outside of the teaming menu by selecting some context menu options on a object with the rgdlx extension. The teaming.rgdlx should never be used for running these options to avoid problems with the teaming submenu options. The teaming.rdglx object is however a good candidate to copy and store under a different name in any location within the project.

■ Restore Definition

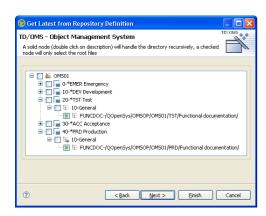
Restore Definition
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This option enables you to change which IFS trees must be read during the retrieval process.



The screen shows the Host and application related to the project

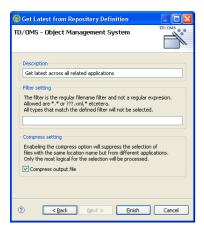
Pressing next> will show the application environment/sub environment definition. You can expand the environments and sub-environments to show the underlying routes.



Clicking inside a check box in front of a route will put a check mark (|\overline{\pi}|) to indicate that only objects in the location shown are taken into account.

Double clicking the route will change the check box into a solid node (🖪) to indicate that objects in the location shown and in locations below the location shown are taken into account.

The mayor difference with the Set get latest definition described earlier is that Next> button is available.



Filter setting

This filter determines which objects are NOT included

Compress setting

A check mark indicates that application interface definitions are NOT taken into account. Without the check mark other applications (with a import application interface definition for this application) will be taken into account as well.

■ List Get Latest

C List Get Latest

This option will generate a object with the rglrx extension. This objects contains the (xml) definition of the objects to be imported and open the file in the editor area. This object can be used as part of the CRTBLDDIR command on the IBM i to retrieve objects from various locations on the IFS and place them in a different IFS location without the requirement to use a eclipse project.

■ Fetch Get Latest

剧 Fetch Get Latest

This option will execute the retrieval of the objects and store these as unmanaged objects within the project.



### Ratifying a request or a task

<translate>

#### What is ratification?

When ratification is activated either at the task level or at the request level, then transfer from the environment in question is allowed only after the approval of one member from every activated ratification group.

Ratification on task level is well suited to enforce more technically oriented ratifications. Activate ratification on task for the test-environment, define a ratification group containing the members of the quality assurance-team and a transfer to the next (eg acceptance) environment will only be possible when one of the members approves.

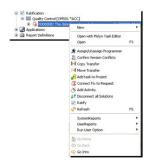
Ratification on request level is well suited to enforce more functionally oriented ratifications. Activate ratification on request for the acceptance-environment, define a ratification group containing the members of the test-team and a transfer to the next (eg ready for implementation) environment will only be possible when one of the members approves. /translate>

#### How to ratify

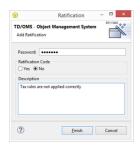
Expand Ratification under the system you are working on. All authorized ratification groups for the configured (and authorized) applications/environments will be visible



All tasks or requests you have to ratify can be accessed by expanding the ratification groups.



Select the Ratify action from the context menu to start the ratification process. The ratification process will prompt you to enter the required information



The password is the actual system password, belonging to your user profile. The ratification code has two possibilities

Yes The ratification group approves to move the task/request to the next environment

NoThe ratification group does NOT approve to move the task/request to the next environment

In case you change your mind, you can ratify again with a different choice, as long as the request/task is not processed. After processing, the task/request will disappear from the ratification view. </translate> <translate> <translat

#### History

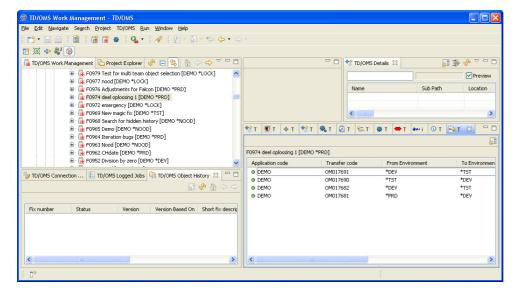
<translate:

#### Transfer history

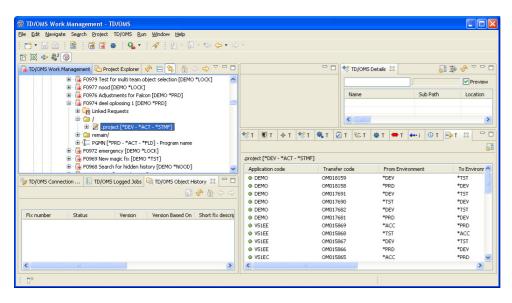
All activities during an object transfer are written into the TD/OMS log. Examining the log can be very helpful, especially when trying to determine what has gone wrong when an error has occurred during a transfer.

Open the TD/OMS History View. There are two levels of transfer history.

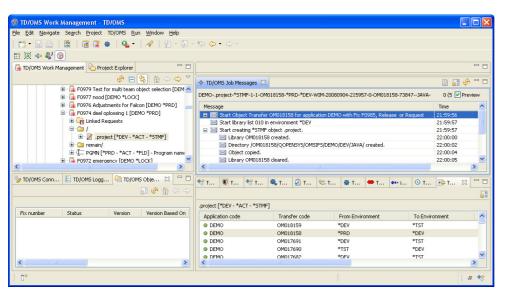
1 Selecting a task in the TD/OMS Work Management View will show the associated transfers.



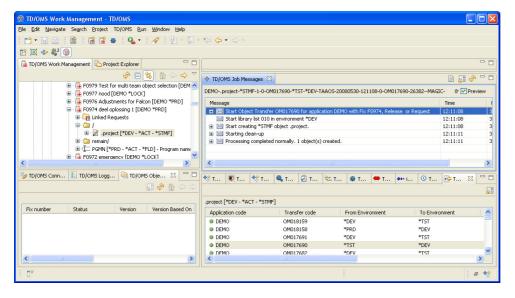
2 Select a component from the previously selected task. The view will show all transfers associated with the component. Because a component can be part of many tasks, this history can be quite large.



Open the TD/OMS Job Messages View. Selecting a transfer in the TD/OMS History view will reveal its messages in this view



When transfers are executed interactively, the log entries will be stored in the log of the "interactive" job. In that case, the logging entries of the actual transfer can not be isolated easily. It is recommended to activate the transfer as a batch job, causing the log of the job to be separated from other events that are also logged.



The remark Start rebuilding relations marks the end of the log writing of a transfer. If an error has occurred, then a separate error log is created. Here the number of the error or warning is given.

#### Remote logs

Logs are also generated on remote systems, for example if a transfer distributes components to a remote system. These logs can be accessed in the same way if the remote systems are defined in the TD/OMS Work Management view. <a href="https://translates/translates/">https://translates/translates/</a>.

# **Version Conflicts**

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#### What are Version Conflicts?

If different versions of the same object are maintained at the same time, TD/OMS requests a confirmation when the second (or higher) version of the object is moved to production.

Maintenance of different versions of the same object at the same time can occur more or less frequently depending on the (defined) cycle. Cycles with an emergency environment and cycles with Application interface definitions are good candidates for version conflicts.

An example:

An application has 4 environments:

*EMER	Emergency
*DEV	Development
*TEST	Test
*PROD	Production

Now, the following happens

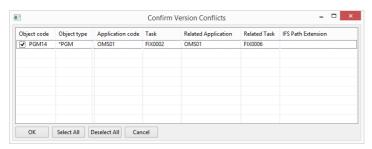
- Program X is copied from \*PROD to \*DEV
- Program X is moved to \*TEST.
- Program X in \*PROD contains a bug that must be fixed a.s.a.p. It is copied from \*PROD to \*EMER
- Program X is moved from \*EMER to \*PROD. The version in production is replaced. Program X in \*TEST is now based on a version that no longer exists in \*PROD.

If confirmation of version conflicts is required, program X in \*TEST cannot be moved to \*PROD without confirmation. </translate>< translate>< transl

### **Confirm Version Conflicts**

The version conflict confirmation process can be activated by selecting **Confirm Version Conflicts** in the context menu for a Solution, Task or Application or by opening the TD/OMS Version Conflicts view, selecting a Solution, Task or Application and selecting **Confirm Version Conflict** in the context menu after selecting the conflicts to confirm (see 2.23 for more information about the TD/OMS Version Conflicts view).

A panel shows all selected objects:

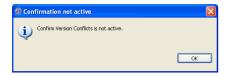


Deselect the conflicts that should not be confirmed and press the OK-button to confirm the selected conflicts. </translate><translate>

#### When is Version Conflict confirmation active?

It is possible that a warning appears when confirming:

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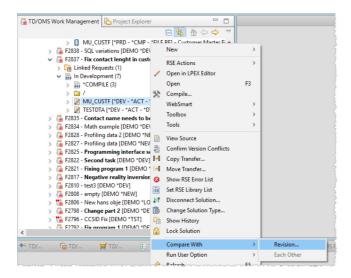
In that case, start TD/OMS on your IBM i and issue the command STRSD (You must have TD/OMS manager or security officer authorisation to do this). This will show the setting for Confirm Version Conflict. If it is set to zero, there is no need to confirm the version conflicts. However, the Version Conflicts View can always be opened.



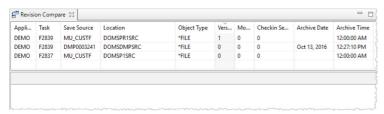
### Compare and Merge Sources

You want to be able to compare your current version of your source with any archived version. You also want to compare and merge the changes that your co-worker added in an emergency session. For this the Compare functionality

You can select an object or a solution and use the "Compare With.." context menu option. Select "Revision.."



A list will be populated with all known versions of this source and it will be displayed sorted on version number with the latest version on top of the list.



The three lines above mean the following.

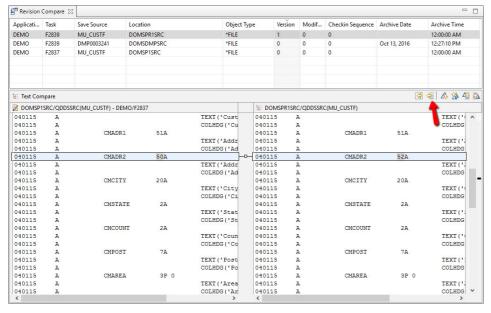
- The top line shows the production source. It has version 1 because it was take through the emergency cycle with Task F2839
- The second line shows an archive copy of version 0 from Task F2839
- The third line shows the source as it currently is in development in Task F2837

### Selecting a source for Compare

Suppose you want to merge the changes from the task F2839. You can compare with the version of the source before the change (DMP0003241) or the version after the change (the top line).

Just doubleclick the desired entry and the compare view will be populated

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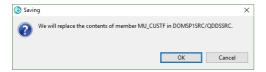


Please note that the source line change date is moved to the beginning of the source. This enables preservation of the source line change date. The sequence of the source is not preserved and the source will be re-sequenced once opened again with the LPEX or SEU editor.

#### Making changes

When you select a development or emergency solution you are able to edit this file by manually coding changes or by using the compare editor. When using the compare editor click the right-to-left option to get a change block from the other version.

After the source was changed, pressing the save icon (or CTRL+S) will save the merged version into the development source.



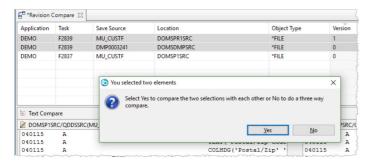
#### NOTES

You have to give enough access to the '/Oppensys/TD/tmp/CMMDIR' directory or any other directory that you designate as work directory with the CMCMORKDIRCANDM registry setting.

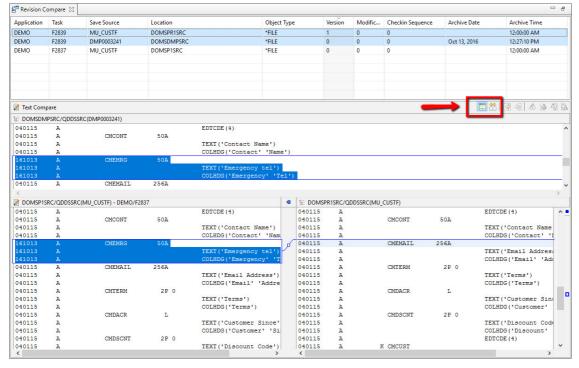
Control characters in the source will be removed when you save.

#### Three way compare I

If you select two elements in the list (hold the CTRL key while selecting) and double-click you get prompted with a question. Choose "No" the start a three way compare

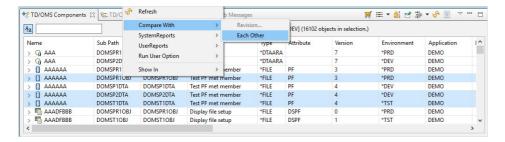


The object with the lowest version number will be the common ancestor except when this is the object that was selected from the components view. You can show the ancestor by clicking the reveal ancestor button.

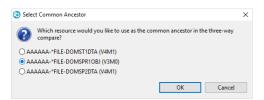


#### Three way compare II

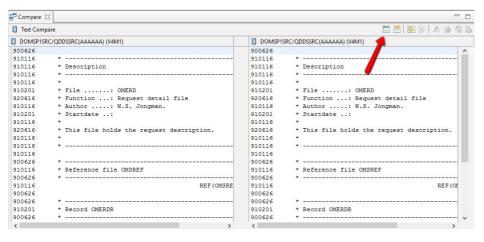
You can also invoke the three way compare by selecting three objects in the components view. This is more useful than it seems because especially when two objects are simultaneously being developed it makes sense to select the two objects and the object in production. Then select compare with each other from the context menu.



A dialog will popup which enables you to select the common ancestor. This is mostly the production object which is most of the times the object with the lowest version number.



You can show the ancestor by clicking the reveal ancestor button.



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### User options

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#### Why User Options?

TD/OMS contains many built-in actions on most types like solutions and objects. If these actions are not enough, User Options can be created to extend the available functionality

These User Options can be selected from the context-menu in most views. The action **Run User Option** shows the Action Groups and the User Options that are not part of a group. Selecting an Action Group shows the User Options of that group. If the group is started with an underscore \_ then the user option group will be placed in the top of the context menu. The picture below shows the context menu with the top level groups in orange highlight.

Only those User Options appear in the context-menu that meet the following conditions:

#### The user must be authorised to use the User Option

It is possible to make a private User Option or a User Option can be authorised for a specific level of access in the application.

#### The User Option must be valid for the selected item

The user option may not be activated for the selected context. The current valid contexts are Task, Request, Component and Solution.

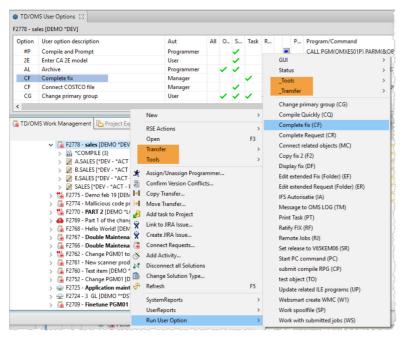


Figure 1: User Option context-menu

A status screen will be displayed after completion.



The Console view will show which errors are encountered. You might have to consult the joblog to find the actual cause of the error.

### Command string substitution parameters

The command string that is entered in the user option can contain substitution variables. Currently the following variables can be used.

Fields from Application Database

&APAPPL	Application code
&APAPNM	Application name
&APERPR	Request manager
&APDMPL	Dump library
&APGL4N	4-GL Name
&APSRCI	Check source indicator
&APCRLS	Release
&APCERR	Request number
&APIERR	Increment
&APCFIX	Fix number
&APIFIX	Increment
&APCNVS	Data conversion scope
&APCATT	Attribute conversion type
&APCATS	Attribute conv. scope
&APCAUT	Authorisation conv. type
&APCAUS	Authorisation conv. scope
&APCJOT	Journal conversion type
&APCJOS	Journal conversion scope
&APMODC	Module code
&APDRVC	Derivation code
&APMTPC	Message 2 programmer code
&APFBLC	Fall back library
&APFJBD	Fast JOBD
&APFJBL	Fast JOBD library
&APSJBD	Slow JOBD
&APSJBL	Slow JOBD library
&APPATH	Path code

### Fields from Component database (objects)

&OBAPPL	Application code
&OBENVC	Environment code
&OBOBJC	Object code
&OBOBJL	Object library
&OBOBJT	Object type
&OBOBJA	Object attribute
&OBOBJD	Object description
&OBSRCF	Source file
&OBSRCL	Source library
&OBSRCM	Source member
&OBSRCS	Sources belong to object
&OBSRCX	Source Change date
&OBOBJX	Object Source change date
&OBOMOD	Object modified
&OBOCRT	User which created object
&OBFIXN	Fix number
&OBUSDF	User defined
&OBEXCI	May not exist indicator
&OBOCLS	Object class
&OBVRSN	Version number
&OBMODN	Modification number
&OBCHGX	Object Change date
&OBIOBC	IFS object code
&OBIDRC	IFS Directory code
&OBGLMC	4-GL Model code
&OBGLLC	4-GL Library code
&OBGLK2	4-GL Additional key 2
&OBGLK3	4-GL Additional key 3
&OBGLK4	4-GL Additional key 4
&OBGLK5	4-GL Additional key 5
&OBGL4N	4-GL Name
&OBGLMD	4-GL Model description
&OBROTC	Route Code
&OBPTHX	Path Extension code
&OBELBC	Extended Library Code

### Fields from Object Detail database (members & messages)

&DTMBRC	Member code
&DTMBRA	Member attribute (MBSEU)
&DTMBRD	Member text
&DTFIXN	Fix number
&DTOMOD	Object modified
&DTUSDF	User defined
&DTEXCI	May not exist indicator
&DTAPPL	Application code
&DTVRSN	Version number
&DTMODN	Modification number

Fields from Solution database

&SOAPPL	Application code
&SOFIXN	Fix number
&SOOBJC	Object code
&SOOBJT	Object type
&SOOBJA	Object attribute
&SOMBRC	Member code
&SOOBJL	Object library
&SOOCLS	Object class
&SOENVC	Environment code
&SOSRCP	Source Processing
&SOVRSB	Version number
&SOMODB	Modification number
&SOVRSN	Version number
&SOMODN	Modification number
&SOOVRC	Override code
&SOSOLT	Solution type
&SOSTAT	Status
&SOROTC	Route Code
&SOELBC	Extended Library Code
&SOPTHX	Path Extension

# Fields from Task database

&FIAPPL	Application code
&FIFIXN	Fix number
&FIFIXT	Fix type
&FIRLSN	Release
&FIDEXN	Development exit count
&FIREAC	Reason code
&FIFIXS	Fix status
&FIPRIN	Priority numeric
&FIPGMR	Programmer
&FIESDT	Expected start date
&FIRSDT	Realized start date
&FIECDT	Expected completion date
&FIRCDT	Realized completion date
&FIEDDT	Expected dev. end date
&FIRDDT	Realized dev. end date
&FIEPHN	Expected number of hours
&FIERHN	Realized number of hours
&FISHFD	Short fix description
&FINACN	Number of ratification grps
&FIACCN	Ratification count
&FIREJI	Rejected indicator
&FIFREE	Free user space
&FIPATH	Path code

### Fields from Request database

&REAPPL	Application code
&REREQN	Request number
&REERRT	Request type
&REENVC	Environment code
&REREAC	Reason code
&REPRIN	Priority numeric
&REUSID	User i.d., or user class
&READDR	User address, distribution
&REUSRI	Distributed user i.d.
&RETELN	Telephone number
&REWCDT	Requested completion date
&RERCDT	Realized completion date
&REINDT	Income date
&REINTM	Income time
&RESHED	Short request description
&RENACN	Number of ratification grps
&REACCN	Ratification count
&REREJI	Rejected indicator
&REFREE	Free user space

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# **Graphical Impact Analysis**

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### The benefits of impact analysis

 $The \ TD/OMS \ kernel \ software \ offers \ the \ functionality \ to \ move \ components \ through \ the \ software \ change \ management \ cycle.$ 

The first question that pops up when looking at a (clearly defined) request for change is: What is the impact of the requested change on our application?

To answer this question you can start looking at the programs or you can use TD/OMS to define and execute the impact analysis rules. Your TD/OMS installation must have a valid TD/OMS Impact Analysis license key to enable definition and execution of the impact analysis rules.

The definition of the Impact analysis rules is not part of the GUI and (in most cases) the responsibility of the TD/OMS (application) manager.

The defined rules can be used to:

- 1. Obtain the correct components by selecting a specific definition in the Impact analysis view.
- 2. Select all components to attach to a task
- 3. Select the task the components must be connected to (if not done yet).
- 4. Connect the components to the task by selecting the appropriate connect action.

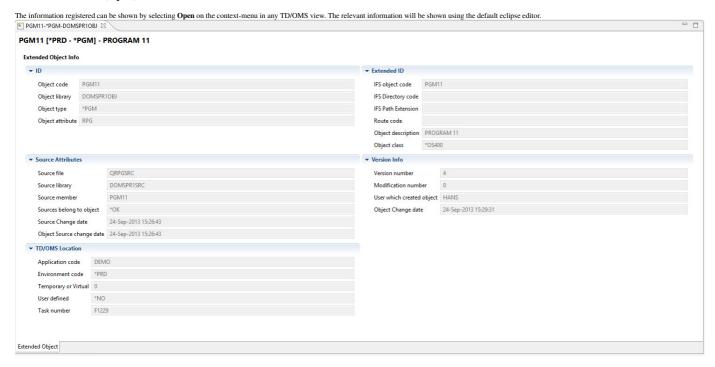
Or you can decide to save an image of the Impact analysis view after step 1. In general an image will make it easier to explain the complexity (and therefore the amount of expected development time) for a requested change.

See 2.8 for more information on the TD/OMS Impact Analysis view. </translate> </translate> </translate>

#### **Context menu actions**

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#### **Show information (Open)**



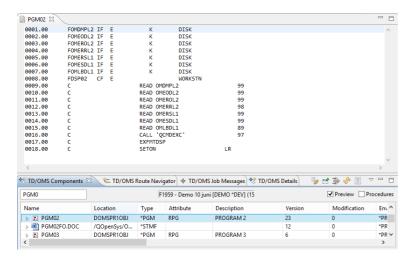
The various tabs can be opened to display the details of the group specified in the header. </translate> <translate>

#### View source

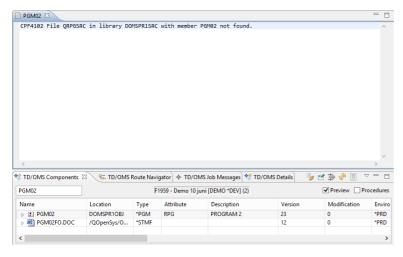
The action View Source displays the contents of the selected component in a separate view. This source can be:

- The SEU-source of an IBM i-object
- The SEU-source-member for a detail-solution representing a source-member.
- The object itself for objects with type \*STMF

Every source is displayed in the editor that is configured in eclipse for the type of the selected component. If such an editor cannot be found, the default text editor is used. This default-editor is also used for SEU-Sources. The SEU-line-number is displayed on the left side. The editor is always opened in read-only mode.

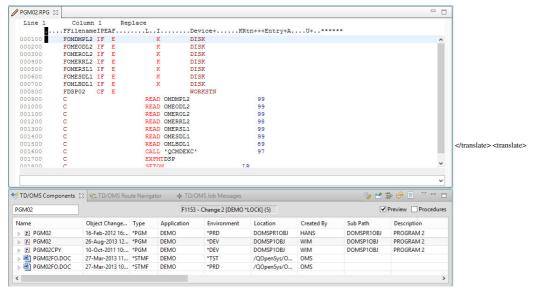


If the source cannot be located a message is shown.



### Open in LPEX editor

This action is only available when working from within the Rational Developer for I (RDi) product. The editor will open in edit mode when used on a solution that is in the development or Emergency environment. It will open in

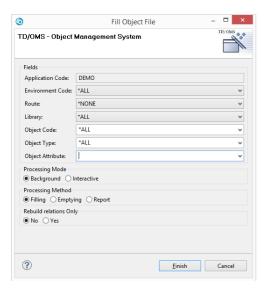


### **Declaring objects**

Objects must be registered within the TD/OMS repository to enable management of the objects within TD/OMS. One way of registering objects is by running the Fill Object File function. This function can be activated by rightclicking:

- an application in the Applications tab of the TD/OMS Work Management View
   a component in the TD/OMS component view
- a route in the TD/OMS route navigator view

Select Fill Object File. The Fill Object File option will only be available when you have sufficient authorisation within TD/OMS.



This function works as the TD/OMS command STRFOF. For an application to be filled quickly, set all fields (except the Application Code) to \*ALL and press the Finish button. </ranslate> <translate>

# **Process Connection List**

A window will be displayed showing the progress of the connection list processing process. The progress bar will be filled during the process. The colour indicates the status of the entire process.

	6 - Object N Connection L	-	nt System	ID/OMS
Status	Log			
Currer	t Object			
Name	PGM14			
Progre	ss			
Comp	onents Proc	essed: 1/1		
Comp	onents Conn	ected: 1		
10	Conflicts Res	olved: 0		
Co	onflicts Rema	ining: 0		

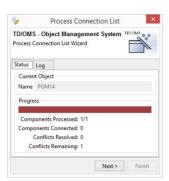
GREEN: No problems found (yet)

0	Process	Connect	ion List	
	6 - Object Man Connection List V		System 1	ID/OMS
Status	Log			
Curren	t Object			
Name	PGM14			
Progre	ss			
Comp	onents Processe	d: 1/1		
Compo	onents Connecte	d: 0		
	Conflicts Resolve	d: 1		
Co	onflicts Remainin	g: 0		
		Г	Next >	Finish

YELLOW: (at least) one of the components had a problem but the problem could be resolved automatically. You can select the Log tab to see what the problem was and how it was resolved.



The settings used for resolving solution conflicts can be maintained within the Preferences (see 1.6.4).



RED: (at least) one of the components had a problem that requires manual intervention. You can select the Log tab to see what the problem is

Sometimes a component must be part of several tasks each requiring a modification of the object. This may cause 'solution conflicts'.

Within a TD/OMS application cycle, an object can have multiple occurrences (in every library and in every environment). A solution however, may occur 'active' only once. If an object is already connected to a task and you want to connect it again to another task, then you have to decide what to do. This process is called 'solve solution conflicts'.

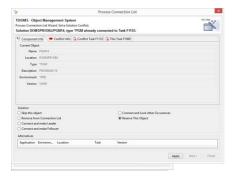
If this occurs you have several choices:

- Connect the object as 'locked'Connect the object and lock the others
- Make this solution 'leader' and the others 'follower
- Make another solution 'leader' and this one 'follower
- Reserve the object

Solution conflicts are automatically detected by TD/OMS when components are linked to a task, i.e. when solutions are being created. When a conflict occurs that can (or should) not be resolved automatically, a panel is displayed for solving the Solution Conflict.

The screen shows information with respect to the Component, Conflict and the conflicting tasks/requests. The Solution options that are displayed on this screen depend on the situation at hand.

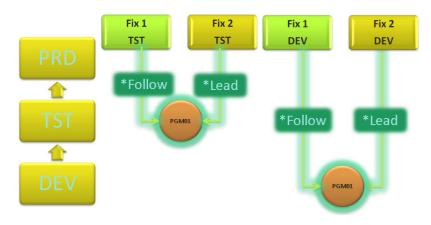
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#### **Explanation of the solution conflict options**

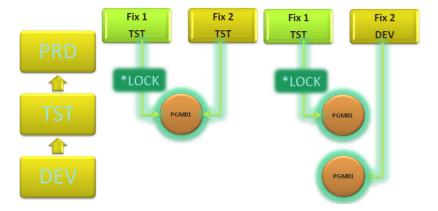
#### ■ Follower / leader

When one of the follower/leader alternatives is selected, then the component connected to the task is the solution that is already active. This solution will now have a role in more than one task. The solution can only be transferred by the task in which it is a leader. The solution in the other task(s) will follow the leader. The example shows a transfer to DEV.



#### Locking

When one of the locking alternatives is selected, then the object that was originally selected for connection is indeed connected, but a lock is applied to this solution or to the solutions that already exist. The transfer will put a copy of the selected object in the development environment.



As long as a solution is locked, it cannot be transferred. Trying to transfer the active solution to the same location as a locked solution will result in a warning that the (locked) solution will be overwritten. Accepting the overwrite will result in a transformation of the \*LOCK into a Follower / Leader (as only 1 object remains after the overwrite).

#### ■ Reservation

Reserving a component means that the component will become available for maintenance as soon as the solution that is currently active is moved to the production environment. At that moment a message will be sent to the user who has made the first reservation. Reserved solutions can be viewed with the TD/OMS Reserved Solutions view (see 2.18).

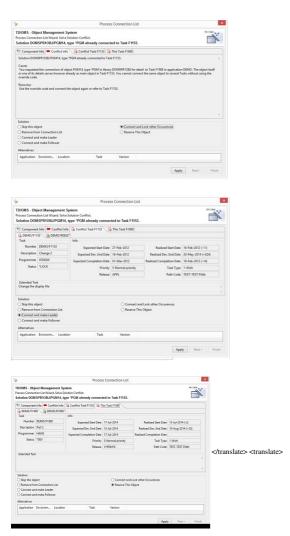
#### ■ Skip

The component is skipped. The component will stay in the connection list. When the same connection list is processed again at a later time, TD/OMS will again try to connect the component.

#### ■ Remove from Connection List

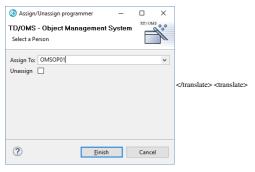
The component will be permanently removed from the connection list.

You can select the various tabs to display the conflict info, information regarding the conflicting task(s) and information regarding the current task



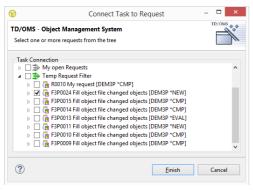
### Assign/unassign programmer

This action is used to change the person assigned to the selected task(s). The person currently assigned to the first selected task in the list is the programmer shown as the default for the assignment. The special value <unassigned> is available to remove a previous assignment. This value can be easily filled in by checking the "Unassign" checkbox that is added as of TD/OMS V9 Milestone 3.



### **Connect Task to Request**

This action is used to connect a task to 1 or more requests.



It is possible to create a new (temporary) Request filter to enable selection of requests from applications not available within the existing filters. Requests can be selected by clicking the checkbox. </translate>

### **Connect Request to Task**

This action is used to connect a request to 1 or more tasks.

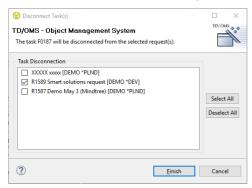
It is possible to create a new (temporary) Task filter to enable selection of tasks that are not available within the existing filters. </translate> <translate>

#### **Disconnect Task**

The Disconnect Task action is used to disconnect tasks from requests and can operate in two modes:

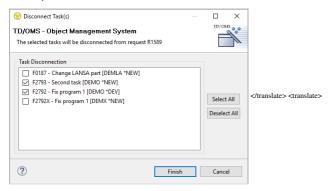
#### When a Task is Selected

When a task is selected then this action shows all connected requests. You are able to select one ore more requests to disconnect.



#### When a Request is Selected

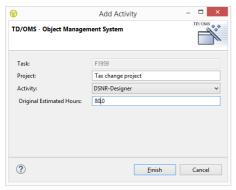
When a request is selected then this action shows all connected tasks. You are able to select one ore more tasks to disconnect.



### **Add Activity**

This action is only available when the (optional) hour registration module has been activated and is part of the task context menu

The screen enables you to register the estimated hours for each activity available in the activity table with respect to the selected task.

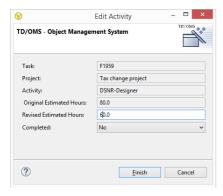


Registration of the estimated hours is only possible once. The Activity view offers you the opportunity to enter a revised number of hours or to remove the activity. After removing you will be able to add the same activity for the task again. </rranslate>

#### **Edit Activity**

This action is only available when the (optional) hour registration module has been activated. Open the TD/OMS Activity view and select Edit from the context menu of a selected activity.

The screen enables you to register the Revised estimated hours for each activity available in the activity table with respect to the selected task.

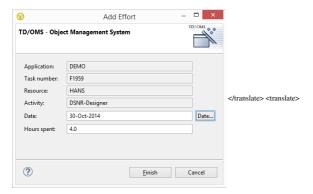


It is also possible to indicate that that activity being edited has been completed. Changing completed to Yes will disable the Add/Edit Effort actions. You can change this value back to No again at a later moment in time. </translate>

### **Add Effort**

This action is only available when the (optional) hour registration module has been activated. It is available in the TD/OMS activity view on the context menu of your name.

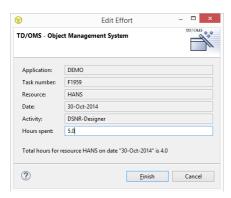
The screen enables entry of the total amount of time spend by you on a specific activity during a specific day.



### **Edit Effort**

This action is only available when the (optional) hour registration module has been activated.

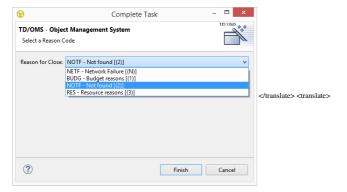
The screen enables you to change the total amount of time spend by you on a specific activity during a specific day.



The total hours you have already reported (including the amount of time you originally reported on the activity being edited) is displayed as a reminded. </translate> <translate>

### **Complete Task and Complete Request**

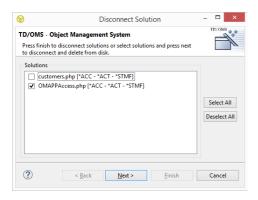
It is not possible to delete a task or Request after it has been generated. A task or request may become redundant after being created (e.g. due to changes in business requirements the requested change is no longer required). You could complete the Request and related tasks by moving them through the cycle without solutions but this requires additional activities. These actions are used to change the status of a task or request to complete and to register the selected reason code with the task/request. Complete Task and Complete Request will only be available as an option from the context menu when the status of the Task/Request is equal to \*NEW.



#### Disconnect solution

A solution is generated by connecting a component to a task. There may come a moment when you want to disconnect the solution. This can be because you have selected the incorrect component, because you want to connect the solution to another task or because you no longer require the solution and you want to complete the task.

The Disconnect solution action will process the selected solutions and enables you to indicate that (a subset of) the selected solutions should also be removed from disk.



Selecting solutions in the Disconnect Solution action should only be done when you are absolutely certain that this will not lead to loss of information. The finish button will be disabled when you select a solution. Press the Next button to display the confirmation screen.



This action will remove the objects and should not be applied when objects are required in a sub environment. It will be required to perform additional activities (eg manually restore objects, perform a manual fall-back or undo a database conversion) to restore these required objects to their previous state. </translate>

### **Change Solution Type**

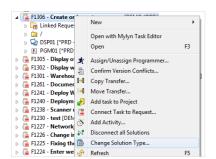
Solutions can be of three types:

- 1 or \*CHANGE
  - The object will be changed as part of a normal maintenance cycle.
- 3 or \*COMPILE
  - The object will be recompiled but it will not be changed \*TERMINATE
- 9 or \*TERMINATE

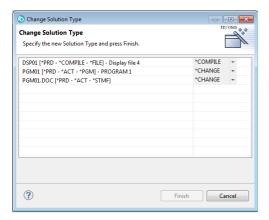
The object will be removed from the application.

A solution is generated by connecting a component to a task. Normally, the solution will be a \*CHANGE solution. The "Change Solution Type" wizard enables you to change the type.

To start this action, select one or more Solutions or one Task from the Work Management view and open the context menu.



From the menu select the option  ${f Change\ Solution\ Type\ ...}$ . This will start the following wizard.



Use the combo box to change one or more Solutions to a different type and press "Finish".

#### **Possible Conflicts**

You can only change a Solution to \*COMPILE in the development or the production environment. You may change a Solution to \*TERMINATE everywhere but please keep in mind that the Solution will not be removed from lower environments and/or remote systems that are below the environment that the Solution is in when you select this action.



■ This page was last modified on 13 December 2016, at 10:31.