



|| IBM Software Group

# Revitalizing your CICS

## Session 3: Simplifying your IT Environment

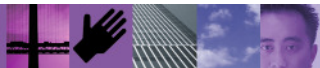
A decorative horizontal bar with a purple background, featuring a series of colorful squares (cyan, green, yellow, red) and various icons (a starburst, a person's face, a globe, a grid of dots) on the left side.

**ON** DEMAND BUSINESS™

© IBM Corporation 2009

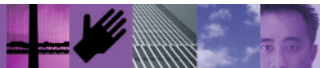
## Agenda

- **Comply and Control**
  - ▶ IP Connectivity in CICS 15 mins
  - ▶ ID Propagation
  - ▶ CICSplex SM Workload Manager
  - ▶ DLA and the CICS data model
  
- **CICS Explorer** 40 mins
  - ▶ Base and Extending
  - ▶ Plug-ins (CM,IA and PA)



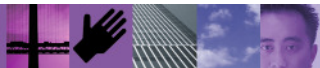
## CICS Support for IPv6

- **Allow for IPv4, IPv6 or host names in:**
  - ▶ Resource definitions
  - ▶ Application Programming Interface
  - ▶ Systems Programming Interface
  - ▶ User Replaceable Modules
  - ▶ Global User Exits
  - ▶ Monitoring Records



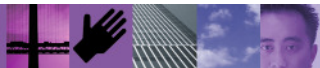
## IP Interconnectivity

- **Continuation of the CICS IP interconnectivity strategy**
  - ▶ Provide a new transaction IP communications protocol for connectivity between and into CICS
  - ▶ Long term plan to provide CICS with IP choice for most of the CICS programming model
- **Enhancements to support 3270 transaction routing**
  - BMS, security and monitoring support
  - Shippable terminals supported
  - Restrictions
    - Routable(YES) on transaction definition
    - No EDF
    - BMS routing support
    - No routing for APPC devices
- **Enhancements to Asynchronous Starts**
  - ▶ ATI over IPIC supported



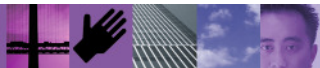
# Identity Context Propagation

- **z/OS Identity Propagation initiative to provide asserted identity for end-to-end distributed security**
  - ▶ Logically tie together distributed end-user identities with z/OS userids
  - ▶ Enhance the ability for z/OS applications to participate centrally in SOA solutions
  - ▶ Function will require z/OS 1.11
- **ID Context Propagation allows an end user's identity to be propagated through to CICS**
  - ▶ Currently, the end users' identity is lost before the request gets to CICS

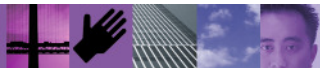
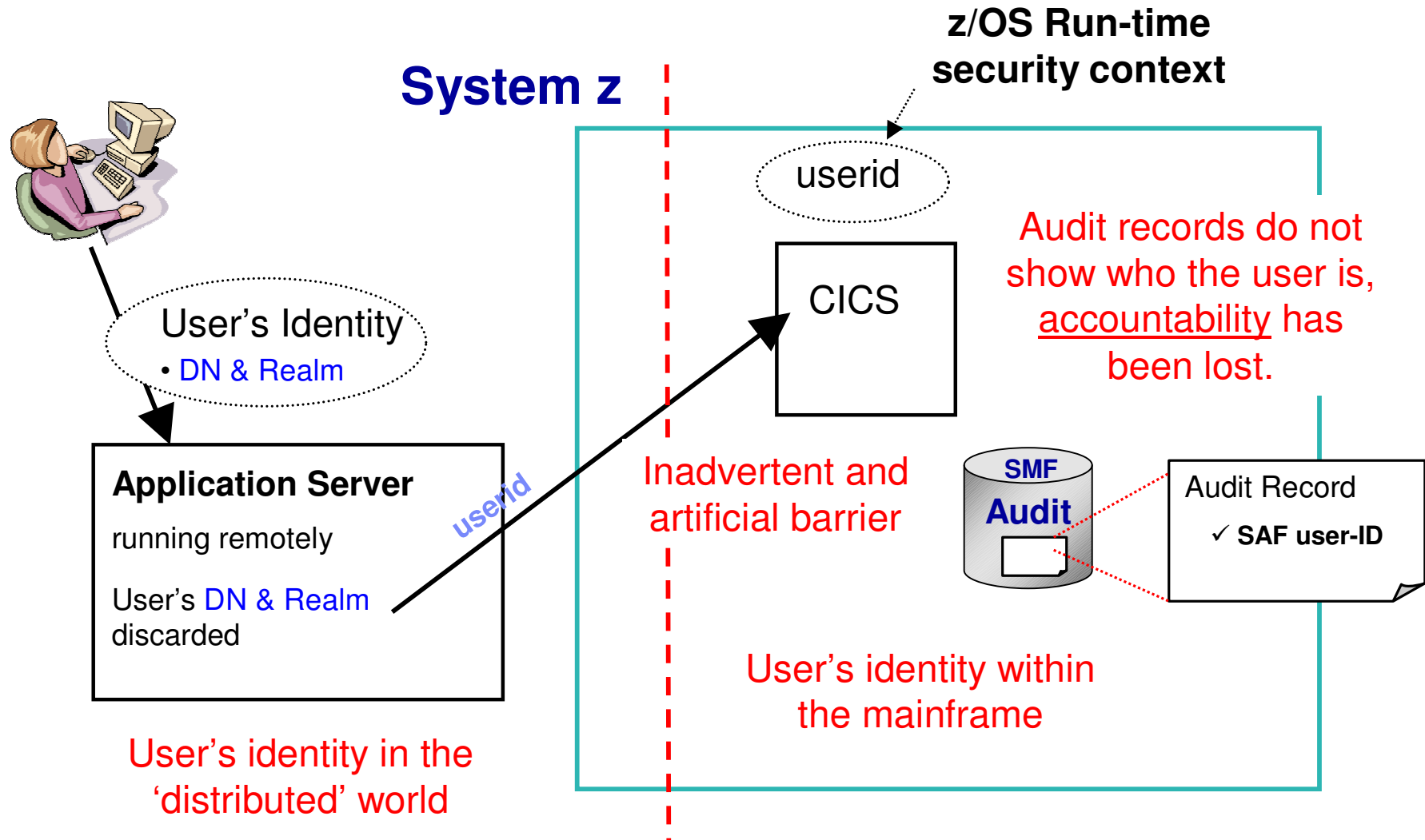


## Identity Context Propagation...scenarios

- **Support for Inbound Web services, propagating on as Web Service provider**
  - ▶ Provides support for Web Services callers
- **Support for Inbound over IP Interconnectivity (IPIC)**
  - ▶ Used by CICS TG when operating as a WebSphere connector
    - Will require use of JCA resource adapter
- **Sysplex Support**
  - ▶ CICS will propagate on over MRO and IPIC Connections only

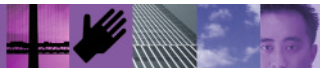


# Identity Propagation – current problem



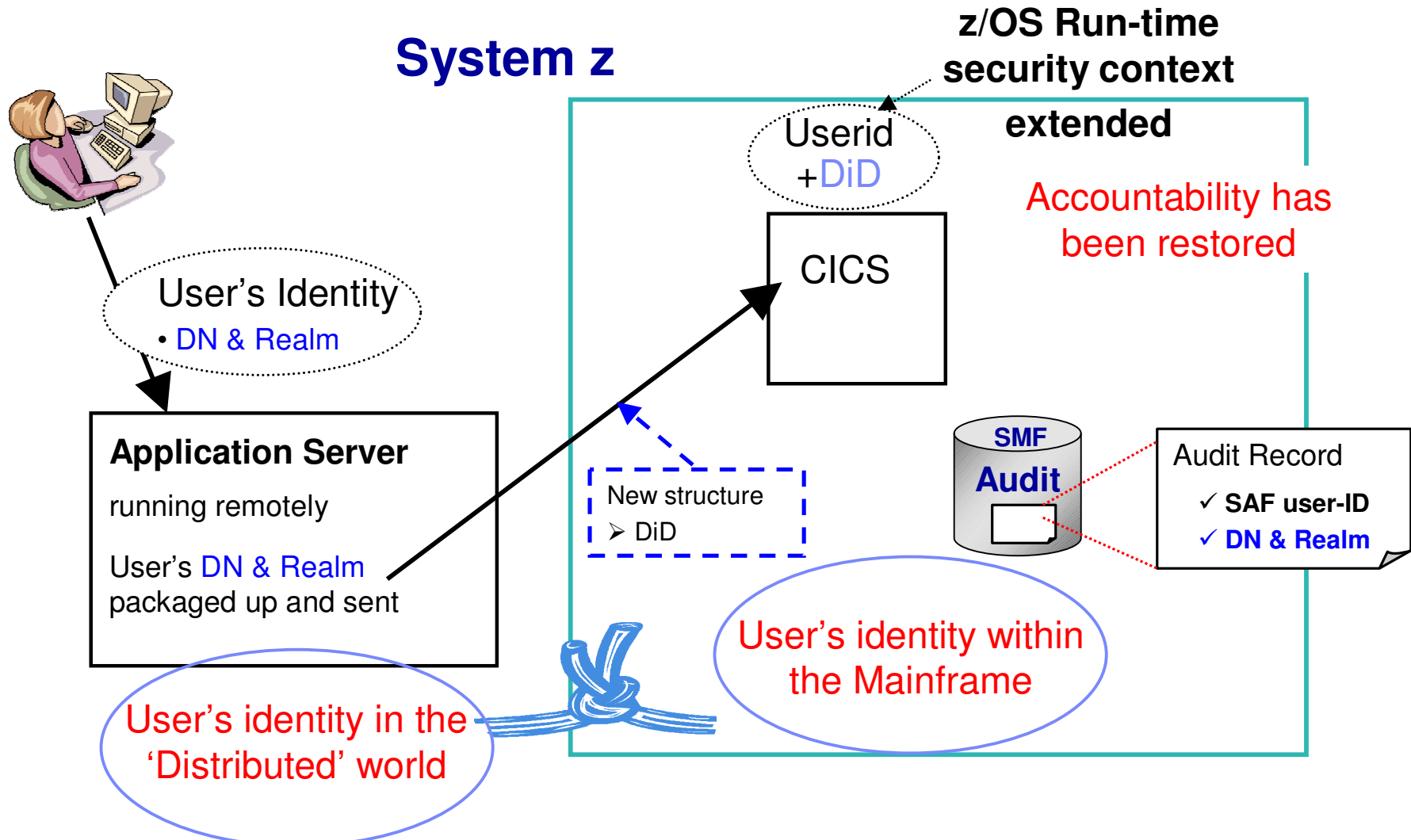
## Remedy

- Platform-architected Distributed Identity solution that subsystems participate in
- An asserted identity for end-to-end distributed security
- That logically ties together distributed end-user identities with userids on the host
- An Identity Context Reference that flows in a trusted way
  - ▶ **X.500 distinguished name of end-user**
  - ▶ **X.500 DN of original registry**
  - ▶ **Optional SAF userid**



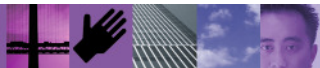


# Identity Propagation – proposed solution

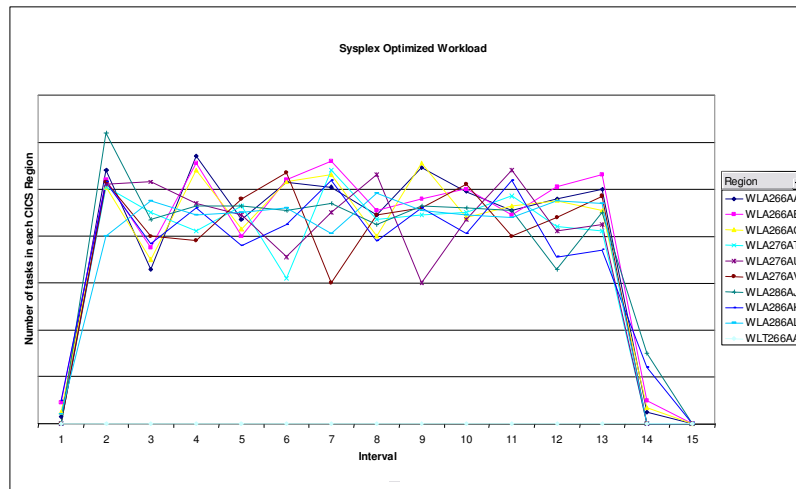
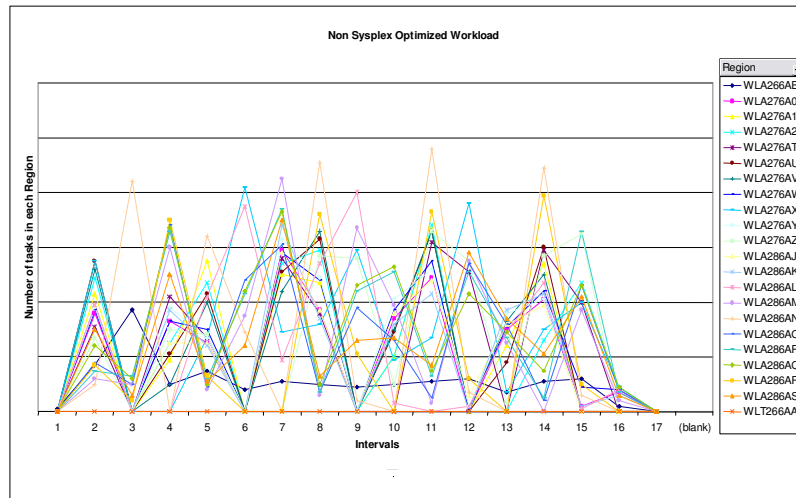


## Workload Management and CICSplex SM

- **Sysplex-optimization to significantly reduce workload batching effects**
  - ▶ Exploitation of z/OS coupling facility
    - “Near real time” Sysplex-wide focus on target region status
    - No impact to “non-optimized” WLM
  - ▶ Optimized WLM routing enabled by configuring a Region Status Server
    - Uses CF Data Table to hold Region Status information
      - SOS, MaxTask, System or transaction dump in progress, Current Tasks?
    - Shared by all routing regions (in the Sysplex)
- **Percentile goals**
  - ▶ CICSplex SM WLM support for percentile goals
- **Support in CICSplex SM for all new resources, statistics, etc**



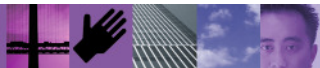
# CICSplex SM WLM: Optimized versus Non-optimized Routing



- **Non-optimized Routing**
  - ▶ 27 CICS regions on 3 LPARs
- **Optimized Routing**
  - ▶ 9 CICS regions on 3 LPARs
- **Comparison**
  - ▶ Workload is 10K started transactions
  - ▶ Number of tasks in each region measured every 10 second interval
- **Results**
  - ▶ Non-optimized environment shows “batching effects
  - ▶ Optimized results shows smoother distribution of work and higher throughput

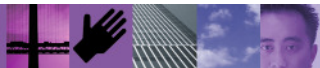
## Discovery Library Adapter

- **The IBM Discovery Library facilitates a common way to share information about discovered resources and relationships**
  - ▶ A set of specifications, components, and best practices for communicating the discovery of resources and the relationships between resources within the enterprise
  - ▶ A way to exchange resource and relationship data across multiple applications.
  - ▶ XML schema specification
- **CICS provides a Tivoli Discovery Library Adapter (DLA) for CICS resources**

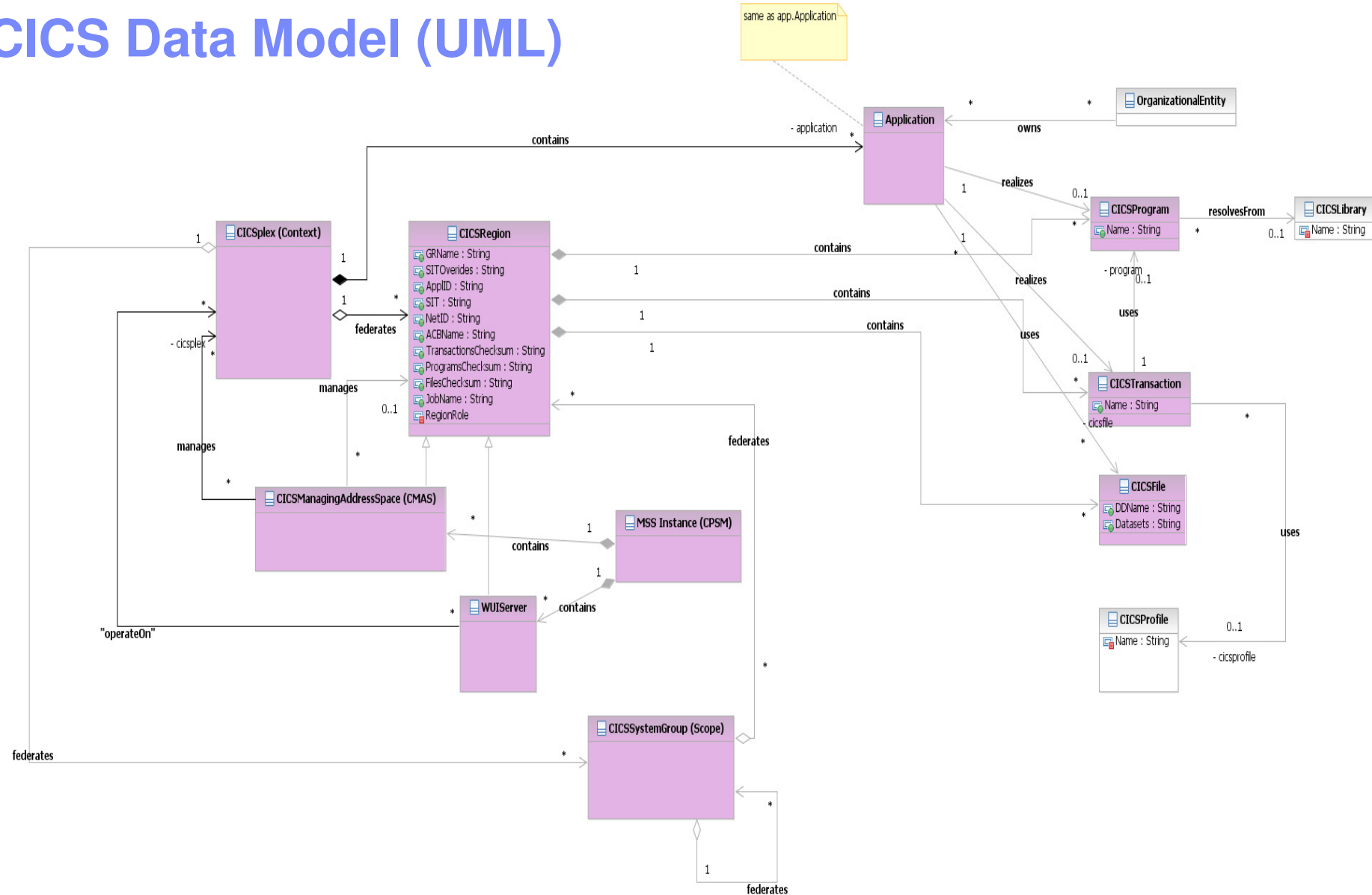


## Discovery Library Adapter Utility

- **CICS DLA Utility (EYUJXDDP)**
  - ▶ Runs as Batch Job or Started Task
    - Range and depth of discovery controlled by parameters
    - Select the books to create:
      - CTSPLEX, CICSplex, CICSREGION
  - ▶ Uses CICSplex SM services to generate XML files
    - Writes IdML books to a PDS
  - ▶ Runs against a specified CMAS
    - CMAS must be current level of CICSplex SM
    - CICS regions discovered by the DLA can be an earlier release



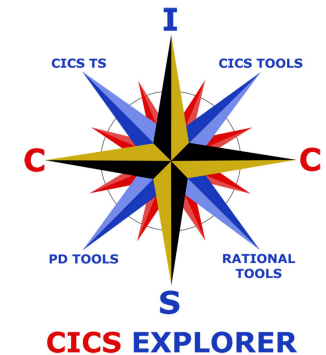
# CICS Data Model (UML)





IBM Software Group

# IBM **CICS** Explorer™ - The New Face of CICS



**ON** DEMAND BUSINESS™

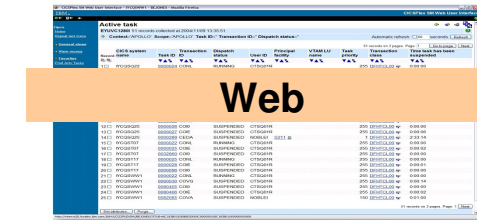
© IBM Corporation 2009

# The changing face of CICS tooling

**CICS Explorer** reduces need for multiple interfaces

Previously...

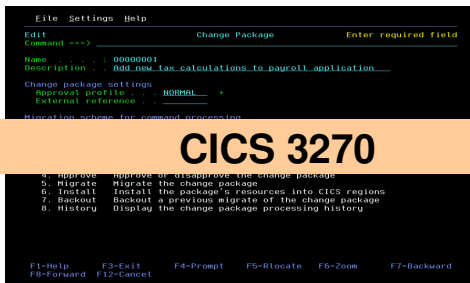
Now ...



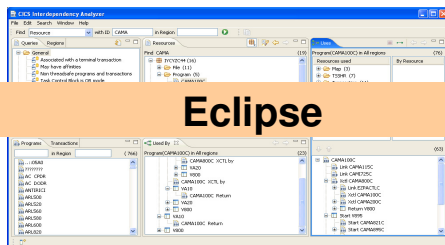
Web



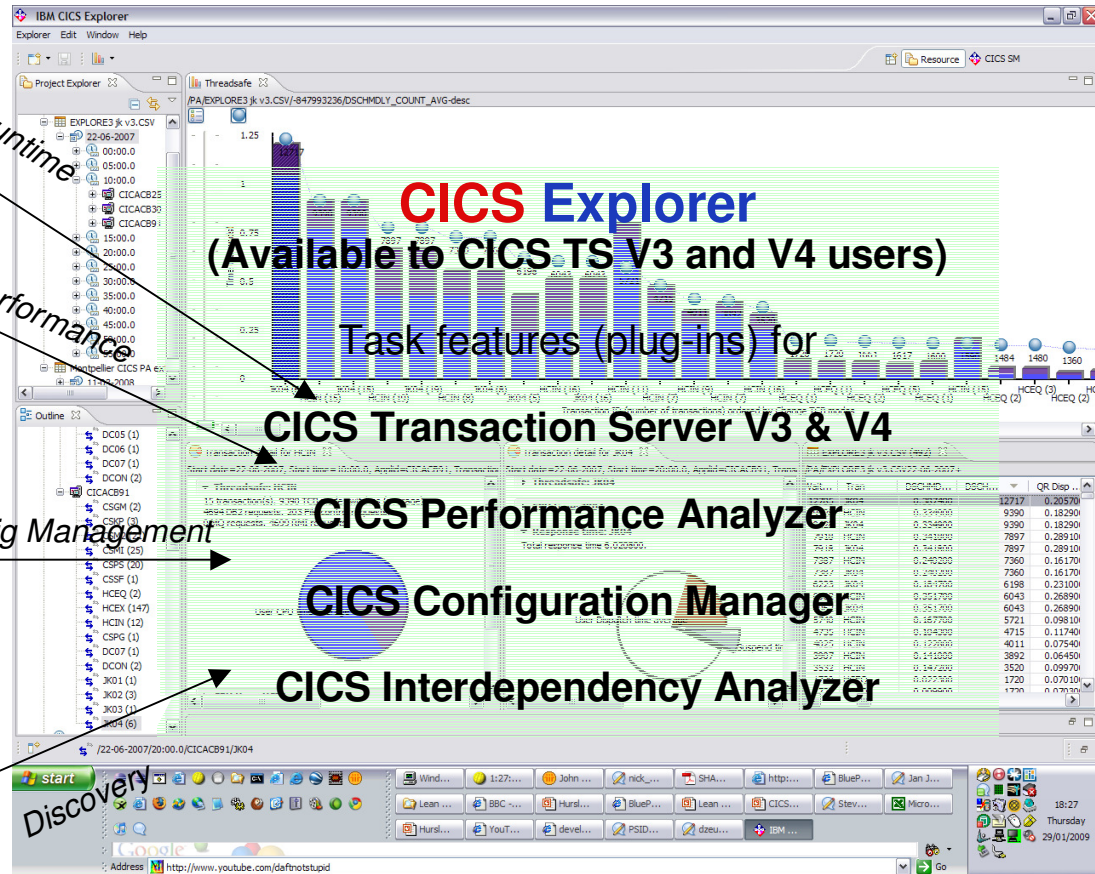
ISPF



CICS 3270



Eclipse



**CICS Explorer**

(Available to CICS TS V3 and V4 users)

Task features (plug-ins) for

CICS Transaction Server V3 & V4

CICS Performance Analyzer

CICS Configuration Manager

CICS Interdependency Analyzer

Runtime

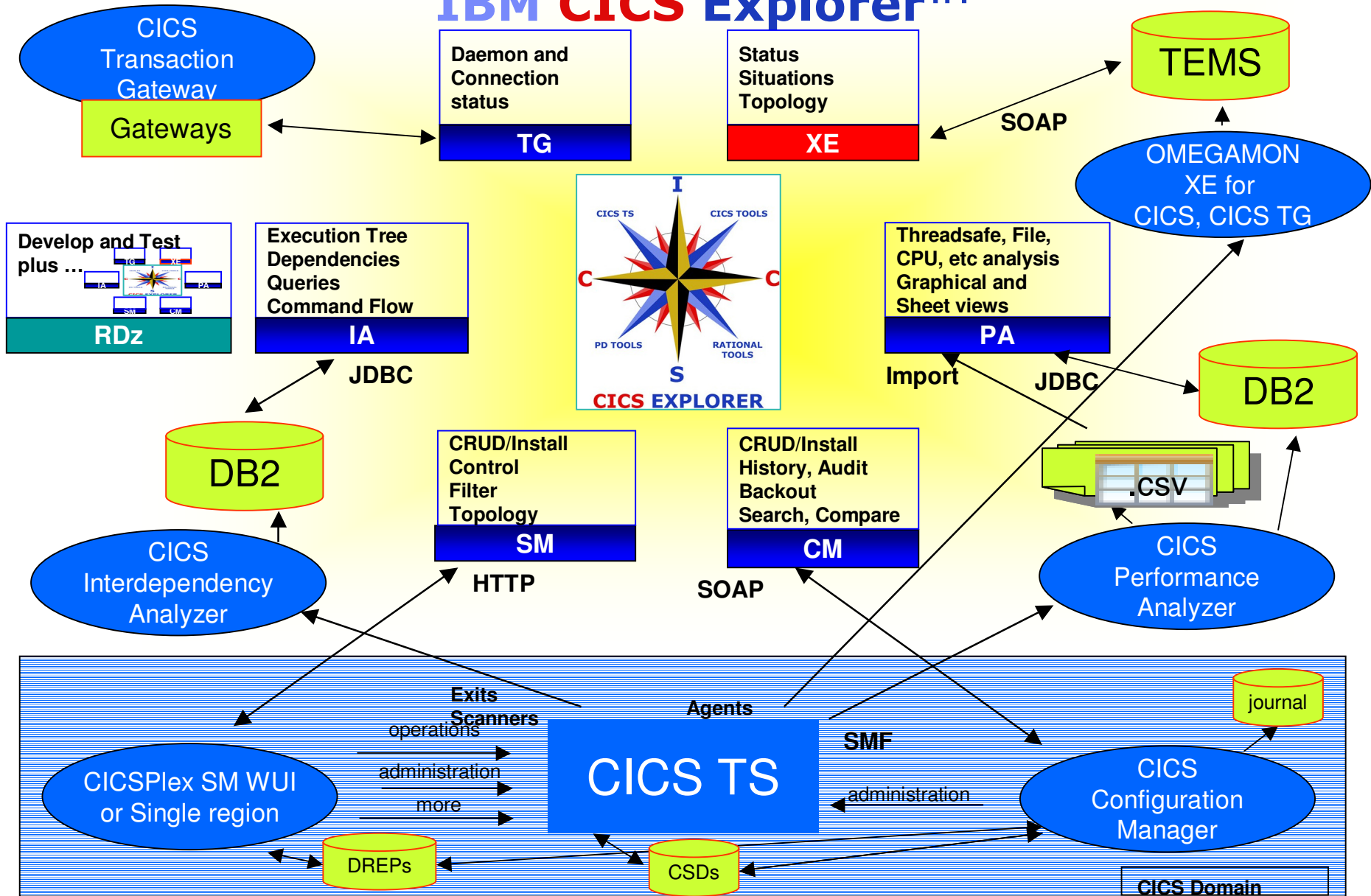
Performance

Config Management

Discovery



# IBM CICS Explorer™



# CICS Explorer

View Systems

View status of tasks

Edit Resource Definitions

The screenshot displays the CICS Explorer application interface. On the left, the 'Explorer' pane shows a tree view of system groups and resources. The main area is divided into several panels: 'Tasks' (showing a table of task details), 'Transactions' (showing a table of transaction details), 'Pipeline Definitions' (showing a table of pipeline details), 'Program Definitions' (showing a table of program details), 'Regions' (showing a table of region details), 'Files' (showing a table of file details), 'Events' (showing a table of event details), 'Properties' (showing a table of property details), 'TD Queues' (showing a table of TD queue details), and 'TS Queues' (showing a table of TS queue details). The right-hand side of the interface features a 'Details' pane for the selected resource, showing configuration options like 'Enabled', 'Language', 'Storage', and 'Program reuse'.

Resource and System Groups

Views Program Definitions

Active CICS Systems in the selected PLEX

View Queue Information

# CICS Explorer & CICS Tools: Putting it all Together

Interdependency  
Analyzer

Performance  
Analyzer

Configuration  
Manager

The screenshot shows the IBM CICS Explorer interface with several key components:

- Supplied Samples:** A tree view on the left containing categories like Affinities, Exits, and General, with sub-items such as 'All programs using files' and 'Resource usage by program'.
- CPU time:** A central graph showing response time in seconds over a timeline from 2007-01-11 to 2007-01-12.
- Transaction detail:** A section below the graph showing metrics for a transaction (CRTP), including Threadsafe, CPU time, Response time, Storage, and File usage.
- Lists and ResDescs:** A panel on the right displaying a list of resources and their descriptions, such as CMLABL1, DFH\$IVPL, and DFH\$LIST.
- Orphaned groups:** A section at the bottom right showing a list of orphaned groups for a specific resource (DM01CSD1).

Single point of control for CSDs and DREPs

Lists and ResDescs

Search for Orphaned groups

Timeline of response times

Shipped Sample Queries

View tree of resources used

Resources used by a transaction

Drilldown into transaction

# CICS Explorer - Program Definition editor – CICSplex SM

IBM CICS Explorer

Server: IVCYZC23

Scope: TOOLPLX1. Resource: PROGDEF. 4 records

Name	Version	Created	Changed	Description
IMPACT9	1	Wed Apr 0...	Wed May ...	Lets chan...
JOE	1	Tue Sep 2...	Thu May 2...	Go on baby
JOE1	1	Thu Jul 19...	Thu May 2...	
PEPSIONE	1	Wed Apr 0...	Wed Apr 0...	And chang...

Program Definition (IMPACT9) Lets change this today

**Overview** This is just for your information

**Details**

Name: IMPACT9 Description: Lets change this today

Version: 1 Created: 09-Apr-2008 19:47:50

Enabled Changed: 28-May-2008 18:19:44

Language: COBOL  Non-CICS (Open API)

Threadsafe (use task TCB)  Display ED...

**Storage**

Accept addresses above 16MB line  Use from LPA

Storage key CICS gives control to the program

User (Can only read CICS-key storage)

CICS (Can read and modify CICS-key storage)

**Program reuse**

Always remain in memory for subsequent re-use

Never re-use: A new copy is loaded each time

A Program in memory for re-use is Unloaded at either:

The next dynamic memory compression

When the use count of the Program is zero

**User Data**

1:  2:  3:

Overview Remote Java™ Attributes

Satish 3.1

Everything greyed out because ...

... it's a 3.1 system that uses the CICSplex SM WUI server that is read only.

# CICS Explorer - Program Definition editor - CICS CM

Name	Version	Created	Changed	Description	Status
IMPACT9	1	Wed Apr 09 ...	Wed May 28...	Lets change ...	ENABLED
PEPSIONE	1	Wed Apr 09 ...	Wed Apr 09 ...	And change ...	ENABLED
JOE	1	Tue Sep 26 ...	Thu May 29 ...	Go on baby	DISABLED
JOE1	1	Thu Jul 19 1...	Thu May 22 ...		ENABLED

Revision Time	User Name	Attributes
2008/05/17 23:40:59	CICSUSER	
2008/04/25 16:16:30	CICSUSER	
2008/04/24 11:40:25	CICSUSER	
2008/04/23 22:50:04	CICSUSER	
2008/04/23 22:46:29	CICSUSER	

**The history view shows who made changes, when changed, by attribute**

**The editor is input capable (i.e. fields aren't grey) and changes can be made**

**...because same system connected to using CM**

# CICS Explorer - Powerful, context-sensitive resource editors

The screenshot displays the IBM CICS Explorer application window. The main pane shows a table of resources for the scope 'TOOLPLX1'. The table lists various resources like EXIB, EXIN, EXO, etc., with their versions and creation dates. The right-hand pane is titled 'Extra partition Overview' and shows configuration details for the selected resource 'EXIB', including its name, description, version, and data set name 'FOOBAR'. Below this, there are sections for 'Data set' options (rewind, must exist, etc.), 'Number of Buffers' (set to 1), and 'User Data'.

Name	Version	Created	Changed	Description	Type
EXIB	1	Sun May 18 ...	Sun May 18 ...	Input Data s...	EXTRA
EXIN	1	Sun May 18 ...	Sun May 18 ...	EXTRA type ...	EXTRA
EXO	1	Sun May 18 ...	Sun May 18 ...	Extra Output	EXTRA
EXSY	1	Tue May 20 ...	Tue May 20 ...	EXTRA with ...	EXTRA
INDT	1	Sun May 18 ...	Sun May 18 ...	Indirect Queue	INDIRECT
IND2	1	Sun May 18 ...	Sun May 18 ...	Indirect and ...	INDIRECT
INT1	1	Wed May 21...	Wed May 21...	Intra for Ter...	INTRA
RMT1	1	Sun May 18 ...	Wed May 21...	This is Remote	REMOTE
RMT2	1	Sun May 18 ...	Sun May 18 ...	Remote syst...	EXTRA
TDQD	1	Wed Oct 10 ...	Fri Jan 04 1...	Matthews T...	EXTRA
XTRA	1	Sun May 18 ...	Sun May 18 ...	Extra Queue	EXTRA

**Annotations:**

- Left Callout:** "This shows how for a non-CM connection the history view just gracefully says that the function isn't available." (Points to the 'History' tab in the bottom pane which shows a message: "Resource History For EXIB Only available with a valid Configuration Manager connection")
- Right Callout:** "Editors only show applicable attributes and tabs - overview/runtime/printer are all specific for a TDQ of type 'Extra Partition'" (Points to the 'Overview', 'Runtime', 'Printer', 'Type', and 'Attributes' tabs at the bottom of the right pane)

# CICS Explorer - No “magic” values - File definition editor

**Operations**

Add option	<input type="checkbox"/> No
Browse option	<input type="checkbox"/> No
Delete option	<input type="checkbox"/> No
Read option	<input type="checkbox"/> Yes
Update option	<input type="checkbox"/> No

**Auto journaling**

Journal number	<input type="checkbox"/> NO
Read operations recorded on journal	<input type="checkbox"/> None
Synchronous auto journaling for input	<input type="checkbox"/> No
Rewrite/delete operations recorded on journal	<input type="checkbox"/> No
Add operations recorded on journal	<input type="checkbox"/> None
Synchronous auto journaling for output	<input type="checkbox"/> Yes

(NO, 1-99, blank)

File\_Definition (FC02) Joe's test file

**Runtime**

**Usage**

The kind of operations that can be performed by programs against the file can be controlled to only a subset of allowable CICS functions

<input checked="" type="checkbox"/> Read	Records can be read
<input type="checkbox"/> Browse	Records can be read sequentially
<input type="checkbox"/> Add	Records can be added
<input checked="" type="checkbox"/> Delete	Records can be deleted
<input checked="" type="checkbox"/> Update	Records can be updated

**Auto Journal**

CICS journal names are of the form DFHJnn, where nn is in the range 1 through 99

Do not use auto journaling

CICS journal name:

Synchronously auto-journal records for  Input  Output

Operations to be recorded in the journal

<input type="checkbox"/> Read only
<input checked="" type="checkbox"/> Read update
<input type="checkbox"/> Rewrite and delete
<input checked="" type="checkbox"/> Add write operation before the VSAM I/O operation
<input checked="" type="checkbox"/> Add write operation after the VSAM I/O operation

**Specifying which attributes to log in a journal for a file is very involved in CEDA and the WUI**

**Compare again the CICS Explorer with the WUI**

## CICS Explorer - No “magic” values - Transaction definition editor

Storage clearance status	<input type="checkbox"/> No
Runaway timeout value	<input type="checkbox"/> SYSTEM
Shutdown run status	<input type="checkbox"/> Enabled

*In CEDA or the WUI the user has to know the “magic values”. DTIMEOUT of a TRANDEF contains values of “0” meaning “No timeout”, “SYSTEM” meaning “Use system value” or else a time in milliseconds.*

Transaction Definition (FROG) Maybe a duck

### Termination

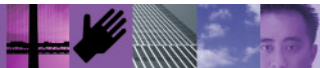
**Runaway**

Time a task can have processor control before it is assumed to be looping and terminated

Use ICVR System Initialization Parameter  
 Do not monitor task for runaway condition  
 Specific Time: [ ] (ms)

**Terminal**

*In CICS Explorer editors, no special values are entered into text fields - everything is done with radio buttons, combos, radios, and other advanced controls*





# CICS Explorer - Editor validation

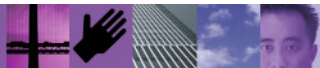
The screenshot shows the 'Pipeline Definition (PIPELINE) Frog' editor. At the top, a red 'X' icon and the text '2 errors detected' are visible. The 'Details' section includes fields for Name (PIPELINE), Description (Frog), Version (1), Created (09-Oct-2007 15:37:58), Enabled (checked), and Changed (14-May-2008 20:04:46). The 'Response Wait' section has a radio button selected for 'Number of seconds' with a text input field containing '20p'. The 'HFS Details' section has a dropdown menu open showing an error message: 'Invalid character '\*' entered. Valid characters are A-Z a-z 0-9 . / \_ 10'. Below this are two text input fields for directory names. The 'User Data' section has three text input fields containing 'EAT', 'SOME', and 'TODAY'. At the bottom, there are tabs for 'Foo Bar', 'Overview', and 'Attributes'.

**An advantage of an Eclipse client over a browser/TSO/ISPF interface which is that keystroke by keystroke client validation occurs making the GUI more responsive (no server roundtrips) and less errors get sent down the wire to CICS making it faster.**

**The pipeline definition below has two errors - 20p is not a valid number ...**

**... and the configuration file name has an invalid character entered.**

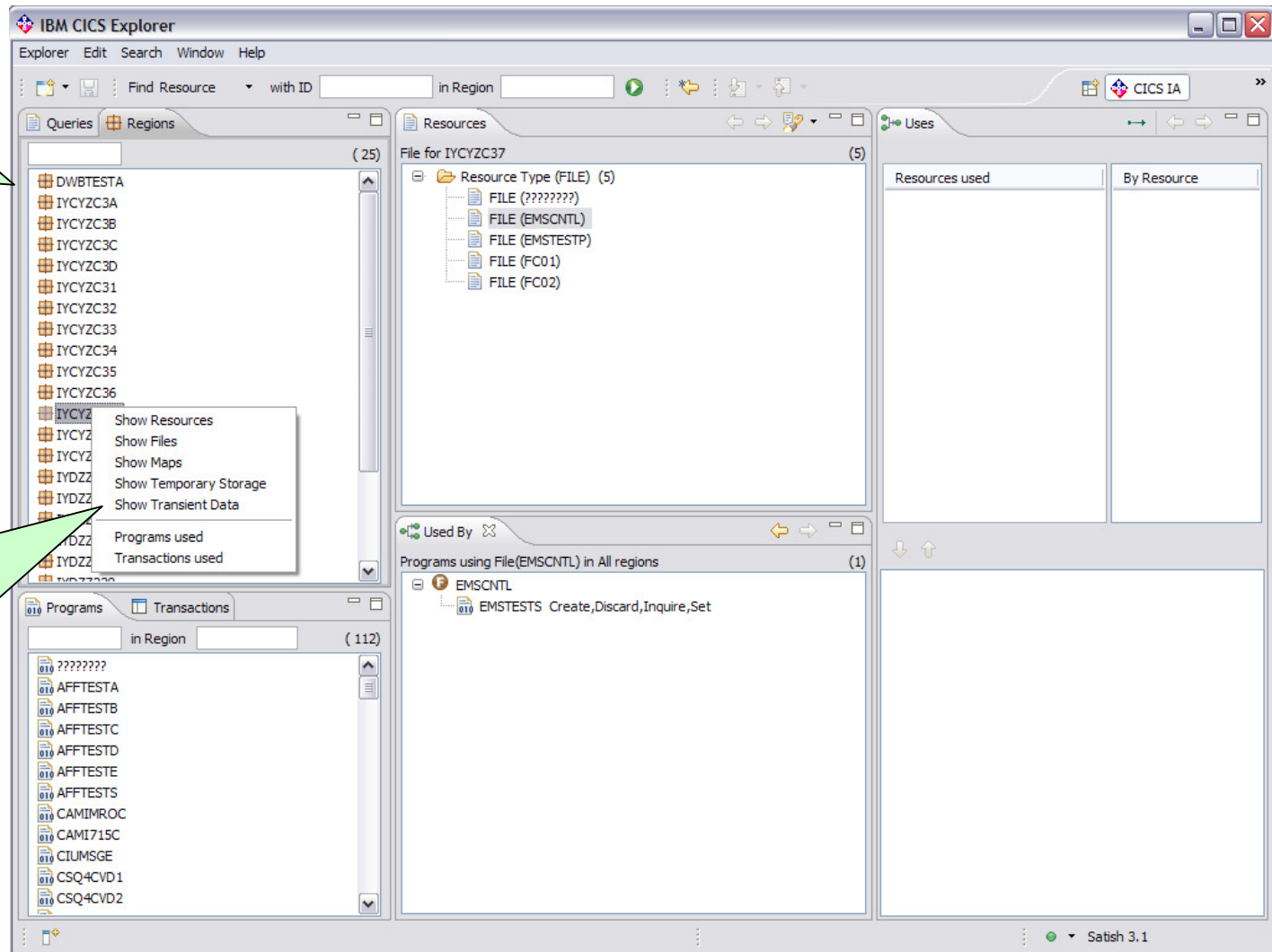
**Each error field has a **red X** next to it to show it's bad, and hovering over the **red X** bring up a tooltip with the error. All errors can be seen by hovering over the **red X** at the top of the screen.**



# CICS Explorer - CICS IA perspective

*Lists regions where the collector has run*

*Lets you do things like see the resources the collector observed and see where they're used.*



# CICS Explorer - CICS IA integration in CICSplex SM perspective

The screenshot displays the IBM CICS Explorer interface. On the left, a tree view shows the CICSplex structure with regions like CICSPLX1 and various CICSADM regions. The main pane shows a table of regions with columns for Name, Status, Use Count, Bridge Exit, Deadlock Ti..., Program, Priority, Transaction..., Purgeability, Dumping, and Routing. A context menu is open over the CICSADM regions, showing options like 'Resources', 'Files', 'Maps', 'Temporary Storage', 'Transient Data', 'Programs Used', and 'Transactions Used'. At the bottom right, a search results window for 'D8CS' is visible, showing a tree view of resources including 'Start DSN8CC0', 'Link DSN8CC1', 'Return D8CS', 'Start DSN8CC1', and 'Start KOCOME00'. A green callout box points to this window.

Region	Name	Status	Use Count	Bridge Exit ...	Deadlock Ti...	Program	Priority	Transaction...	Purgeability	Dumping	Routing
CICSADM30	DCVR	ENABLED	0	0	0	DISCVR	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DIOR	ENABLED	0	0	0	DIOERR	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DSNC	ENABLED	0	0	0	DFHDZCM1	255	DFHTCL00	PURGEABLE	TRANDUMP	STATIC
CICSADM30	DTGN	ENABLED	0	0	0	EQADCCNM	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DTCP	ENABLED	0	0	0	EQAOCDTP	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DTCX	ENABLED	0	0	0	EQANCDTX	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DT00	ENABLED	0	0	0	OISA0000	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DT01	ENABLED	0	0	0	OISA1000	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DT02	ENABLED	0	0	0	OISA2000	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DT03	ENABLED	0	0	0	OISA3000	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DT04	ENABLED	0	0	0	OISA4000	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DT05	ENABLED	0	0	0	OISA5000	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	DWWX	ENABLED	0	0	0	DFHMIRS	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	D8CS	ENABLED	0	0	0	DSN8CC0	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	D8PP	ENABLED	0	0	0	DSN8CP6	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	D8PS	ENABLED	0	0	0	DSN8CP0	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	D8PT	ENABLED	0	0	0	DSN8CP3	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	D8PU	ENABLED	0	0	0	DSN8CP3	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	ECFG	ENABLED	0	0	0	DFH0CFG	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	ECLI	ENABLED	0	0	0	DFH0CLUI	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	ECVR	ENABLED	0	0	0	ENABCVR	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	EGUI	ENABLED	0	0	0	DFH0XGUI	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	EIOR	ENABLED	0	0	0	EIOERR	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	EXCI	ENABLED	0	10	0	DFHMIRS	1	DFHTCL00	PURGEABLE	TRANDUMP	STATIC
CICSADM30	EZAC	ENABLED	0	0	0	EZACIC23	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	EZAO	ENABLED	0	0	0	EZACIC00	255	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	EZAP	ENABLED	0	0	0	EZACIC22	255	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	HPJC	ENABLED	0	0	0	DFHMIRS	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	KBKM	ENABLED	0	0	0	CBKCMINDS	1	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	LSNO	ENABLED	0	0	0	EZACIC00	255	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	MYTD	ENABLED	0	0	0	EZACIC00	255	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC
CICSADM30	NACD	ENABLED	0	0	0	EZACIC00	255	DFHTCL00	NOTPURGEA...	TRANDUMP	STATIC

*The pop-up lets you run the IA query straight from the region and the results are shown in a search results window at the bottom*

*If the IA collector has run in the region - a little decoration is shown in the bottom right hand corner*

# CICS Explorer - CICS IA integration in CICSplex SM perspective

**The list of files in the Explorer - the files actually installed in the region, and their current status.**

**IA extends the context menu (pop-up) so you can easily see the information that IA has about the usage of the file so the "Used By Programs" and "Used By Transactions" ...**

**... is available on a live resource and opens the search results at the bottom.**

The screenshot displays the IBM CICS Explorer interface. On the left is a tree view of CICS resources. The main area shows a table of files for resource CICS91. A context menu is open over the file HCVISIT, showing options like 'Open', 'Enable', and 'Dependencies'. The 'Dependencies' sub-menu is expanded, showing 'Used By Programs' and 'Used By Transactions'. At the bottom, a pane titled 'Transactions using File(HCVISIT) in Region C1CAB91' displays a list of transactions.

Name	Status	Open Status	Add	Browse	Delete	Read	Update
CIUJNT1	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
CIUJNT2	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
CIUJNT3	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
CIUJNT4	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
CIUJNT5	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
CIUJNT6	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
COMPFILE	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
CUSTFILE	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
CVRDEMO	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
DFHCMACD	✓ ENABLED	CLOSED	NO	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
DFHCSD	UNENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
DFHDBFK	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
DFHDPFMB	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
DFHDPFMP	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
DFHLRQ	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
EXMPCAT	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
EXMPCONF	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
EZACONFG	✗ DISABLED	OPEN	NOTADDABLE	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
FMNPROF	✓ ENABLED	OPEN	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
HCREGID	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
HCVISIT	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
OISDDM91	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
POTVSAM	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE
VIDKSDS	✓ ENABLED	CLOSED	AD	ADDABLE	BROWSABLE	DELETABLE	READABLE UPDATABLE

# CICS IA – CICSplex SM integration

The screenshot shows the IBM CICS Explorer interface. On the left, a tree view displays a hierarchy of CICSplex regions, with 'CICACB30' selected. A context menu is open over this region, showing options like 'Open', 'Dependencies', 'Resources', 'Files', 'Maps', 'Temporary Storage', 'Transient Data', 'Programs Used', and 'Transactions Used'. The 'Resources' option is highlighted. In the background, a table lists region details:

Region	Name	Status	Use Count	Bridge Exi...	Deadlock ...	Program	Priority	Transact...	Purgeability	Dumping	Routing
CICSDM30	ADMD	ENABLED	0	0		ADNCRDS	1	DFHTCL00	NOTPURG...	TRANDDUMP	STATIC
CICSDM30	ADMI	ENABLED	0	0		ADNCRDS	1	DFHTCL00	NOTPURG...	TRANDDUMP	STATIC
CICSDM30	CICSDM29									TRANDDUMP	STATIC
CICSDM30	CICSDM30 (CICACB30)									TRANDDUMP	STATIC
CICSDM30	CICSDM									TRANDDUMP	STATIC
CICSDM30	CICSDM									TRANDDUMP	STATIC
CICSDM30	CICSDM									TRANDDUMP	STATIC
CICSDM30	CICSTOL									OTRAND...	STATIC
CICSDM30	EYUMAS1P									OTRAND...	STATIC
CICSDM30	EYUMAS2P									OTRAND...	STATIC
CICSDM30	EYUMAS3P									OTRAND...	STATIC
CICSDM30	WUIPLX1 (1/1)									OTRAND...	STATIC

Below the table, the 'Resources' view for 'CICACB30' is expanded, showing a list of resource types:

- Resource Type (MAP) (2)
- Resource Type (TS) (3)
- Resource Type (ENQNAME) (1)
- Resource Type (FILE) (20)
- Resource Type (TSALUX) (4)
- Resource Type (MAPSET) (2)
- Resource Type (TD) (1)
- Resource Type (PROGRAM) (6)
- Resource Type (TRANSID) (3)
- Resource Type (STORAGE) (1)
- Resource Type (EXIT) (2)

... let's see what resources are being used in this region

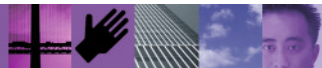
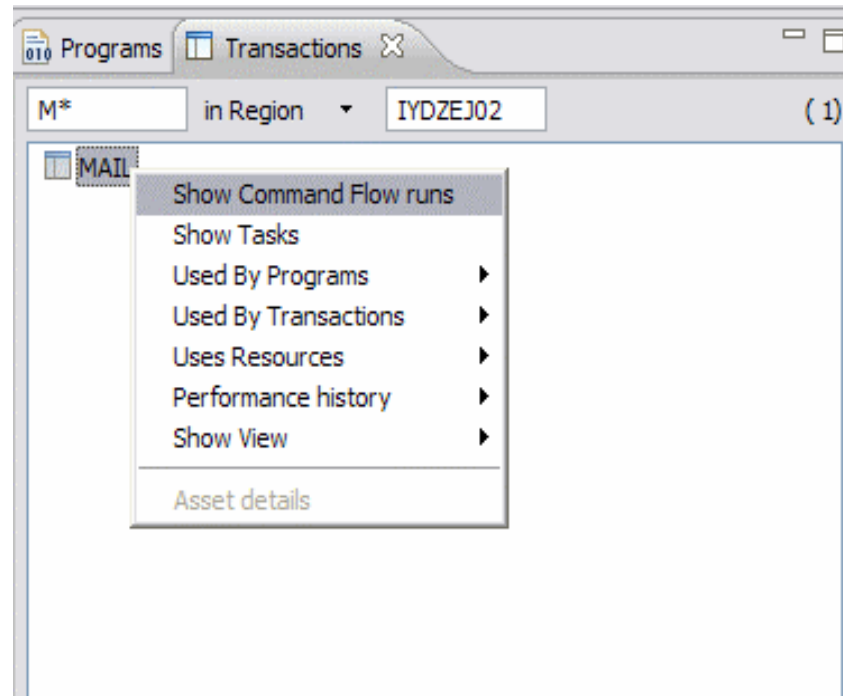
# CICS IA

**View the TD Queues for CICS DM91 in CICS SPLX1 - select CESE - then see which programs use it**

Region	Name	Status	Open Status	Empty Status	I/O Type	Record Length	...
CICSDM91	CCSO	ENABLED	OPEN	NOTEMPTY	OUTPUT	133	VARIABLE
CICSDM91	CCVL	ENABLED	OPEN	NOTEMPTY	OUTPUT	255	FIXED
CICSDM91	CESE	ENABLED	OPEN	NOTEMPTY	OUTPUT	161	VARIABLE
CICSDM91	CESO	ENABLED	OPEN	NOTEMPTY	OUTPUT	133	VARIABLE
CICSDM91	CIBM	ENABLED	OPEN	NOTAPPLIC	INPUT	?	NOTAPPLIC
CICSDM91	CIGZ	ENABLED	OPEN	NOTAPPLIC	INPUT	?	NOTAPPLIC
CICSDM91	CINI	ENABLED	OPEN	NOTAPPLIC	INPUT	?	NOTAPPLIC
CICSDM91	CINL	ENABLED	OPEN	NOTAPPLIC	INPUT	?	NOTAPPLIC
CICSDM91	CINO	ENABLED	OPEN	NOTAPPLIC	INPUT	?	NOTAPPLIC
CICSDM91	CINT	ENABLED	OPEN	NOTAPPLIC	INPUT	133	VARIABLE
CICSDM91	COPR	ENABLED	CLOSED	NOTAPPLIC	INPUT	?	NOTAPPLIC
CICSDM91	CPLI	ENABLED	OPEN	NOTEMPTY	OUTPUT	133	VARIABLE
CICSDM91	CRPO	ENABLED	OPEN	NOTEMPTY	OUTPUT	133	VARIABLE
CICSDM91	CSSL	ENABLED	OPEN	NOTEMPTY	OUTPUT	136	VARIABLE
CICSDM91	CKRF	ENABLED	OPEN	NOTEMPTY	RDBACK	32767	VARIABLE
CICSDM91	FMNC	ENABLED	CLOSED	NOTAPPLIC	INPUT	?	NOTAPPLIC
CICSDM91	FMNJ	ENABLED	CLOSED	NOTAPPLIC	OUTPUT	?	NOTAPPLIC
CICSDM91	FMNM	ENABLED	OPEN	NOTEMPTY	OUTPUT	?	FIXED
CICSDM91	TCPM	ENABLED	OPEN	NOTEMPTY	OUTPUT	?	VARIABLE
CICSDM91	VIDC	ENABLED	OPEN	NOTEMPTY	OUTPUT	80	FIXED
CICSDM91	VIDD	ENABLED	OPEN	NOTEMPTY	OUTPUT	133	FIXED
CICSDM91	VIDE	ENABLED	OPEN	NOTEMPTY	OUTPUT	80	FIXED

**then drill down to the application structure**

# CICS IA – Command Flow



# CICS IA – Command Flow

IBM CICS Explorer

Explorer Edit Search Window Help

Find Resource with ID in Region

Queries Regions Applications (4)

- IYDZEJOB
- IYDZEJ02
- IYDZEJ03
- IYDZZ328

Programs Transactions (1)

M\* in Region IYDZEJ02

- MAIL

Resources (46)

Command Flow runs for TRANSID (MAIL)

- MAILON31 (17)
  - TASKID (0000049C)
  - 2009-06-03 16:01:14.068741 (1)
  - 2009-06-05 11:43:17.510232 (1)
  - 2009-06-05 11:43:18.800904 (1)
  - 2009-06-05 11:43:19.532092 (1)
  - 2009-06-05 11:43:20.50955 (1)
  - 2009-06-05 11:43:21.90764 (1)
  - 2009-06-05 11:43:22.594371 (1)
  - 2009-06-05 11:43:23.509652 (1)
  - 2009-06-05 11:43:24.509607 (1)
  - 2009-06-05 11:43:25.523145 (1)
  - 2009-06-05 11:43:26.509699 (1)
  - 2009-06-05 11:43:31.728357 (1)
  - 2009-06-05 11:43:32.103825 (1)
  - 2009-06-05 11:43:32.883993 (1)
  - 2009-06-05 11:43:33.722729 (1)
  - 2009-06-05 11:43:35.171807 (1)
  - 2009-06-05 11:43:35.840939 (1)
  - MAILON41 (1)
  - MAIL41QR (27)
  - MAIL41TS (1)
  - 2009-06-04 09:47:31.051835 (1)

Resources used

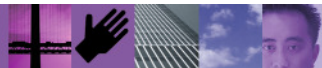
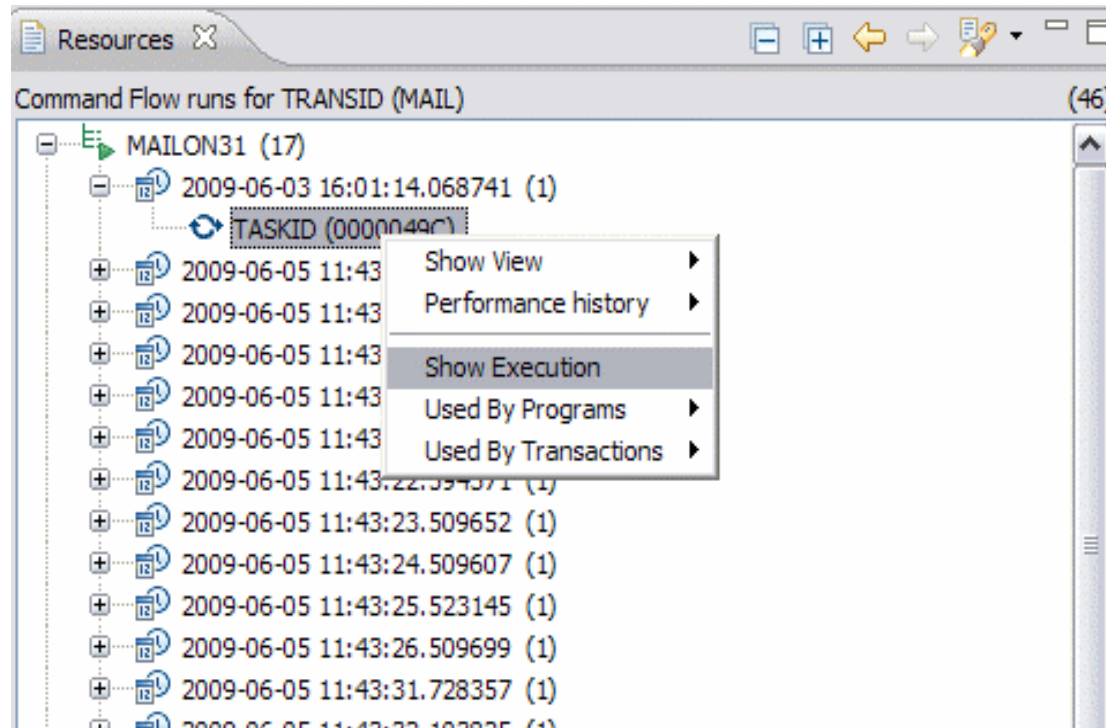
By Resource

CNX0 100I Connected user JAMESE to host winmvs2f.hursley.ibm.com on port 48001

REDTOOLS



# CICS IA – Command Flow



# CICS IA – Command Flow

**IBM CICS Explorer**  
 Explorer Edit Search Window Help

Find Resource with ID  in Region

Uses Command Flow

TASKID(0058481C) under TRANSID (MAIL) Total commands: 87

**TCB Modes Used**

- QR (63)
- L8 (24)
- Open
- Close
- Open CSQ4SAMP.MAIL
- Put1 CSQ4SAMP.MAILM
- Put1 CSQ4SAMP.MAILM
- Getmain STORAGE\_ADI
- Ignore
- Deleteq MAILTC55
- Get CSQ4SAMP.MAILM
- Writeq MAILTC55
- Get CSQ4SAMP.MAILM
- Writeq MAILTC55
- Get CSQ4SAMP.MAILM
- Writeq MAILTC55
- Get CSQ4SAMP.MAILM
- Writeq MAILTC55
- Get CSQ4SAMP.MAILM
- Ignore
- Readq MAILTC55
- Readq MAILTC55
- Readq MAILTC55
- Get CSQ4SAMP.MAILM
- Ignore
- Get CSQ4SAMP.MAILM
- Ignore
- Close CSQ4SAMP.MAIL

**TCB Mode Switches**

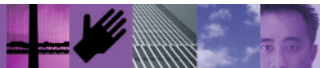
- QR (6)
- L8 (6)
- QR (6)
- Send CSQ4VD1
- Send CSQ4VD4
- Send CSQ4VD2
- Send CSQ4VD3
- Send CSQ4VD3
- Send

	TCB Mode	Previous TCB Mode
<b>MAIL</b>		
TST4CVD1		
Start of transaction	QR	QR
Getmain STORAGE_ADDRESS=13C04008	QR	QR
Ignore	QR	QR
Assign	QR	QR
Send CSQ4VD0	QR	QR
Receive CSQ4VD0	QR	QR
Open	L8	QR
Close	L8	L8
Open CSQ4SAMP.MAILMGR.JAMESE	L8	L8
Send CSQ4VD1	QR	L8
Receive CSQ4VD1	QR	QR
TST4CVD4		
TST4CVD1		
TST4CVD2		
TST4CVD3		
TST4CVD2		
TST4CVD3		
TST4CVD2		
TST4CVD1		

Info CNX01001 Connected user JAMESE to host winmvs2f.hursley.ibm.com on port 48001 REDTOOLS

## CICS PA plug-in to the CICS Explorer

- **Provides numerous methods of visualizing historical transaction performance summary data**
- **Access to performance data summaries and reporting scenarios using CICS PA created ...**
  - ▶ CSV files from SMF 110 performance data
  - ▶ CSV files or database (DB2) from HDB performance data
- **Integrates with the strategic CICS Explorer and other tooling plug-ins**
- **Evolutionary and responsive solution**



# CICS PA - Visualizing the summary data

See extracts of the raw data in the Sheet view

The screenshot displays the IBM CICS Explorer interface with several key components:

- Table View:** A data table showing transaction details with columns for Start date, Start time, Applid, Transacti..., Task ter..., Respons..., User Disp..., User CPU..., Suspend..., and Suspend... The table lists various transactions like PDQVARI, HELMCK, PDQDIR, etc.
- Project Explorer:** A tree view on the left showing the project structure, including folders like 'Allsorts', '2008-03-13', and 'XPLR\_C.csv'.
- Transaction Detail View:** A window titled 'Transaction detail for: CRTP' showing an overview with four pie charts for Threadsafes, CPU time, Response time, and Storage. Below this is a 'Response time' table with columns for Response measurement, Time (avg), Count, %Overall, and %Relative.
 

Response measurement	Time (avg)	Count	%Overall	%Relative
Response time:	0.002937	-	-	-
User Dispatch time	0.001620	2	55%	55%
User CPU time	0.000612	2	21%	38%
CICS Key 8 TCB CPU time	0	0	-	-
J8 TCB CPU time	0	0	-	-
L8 TCB CPU time	0	0	-	-
T8 TCB CPU time	0	0	-	-
X8 TCB CPU time	0	0	-	-
CICS Key 9 TCB CPU time	0	0	-	-
J9 TCB CPU time	0	0	-	-
L9 TCB CPU time	0	0	-	-
X9 TCB CPU time	0	0	-	-
Miscellaneous TCB CPU ttr	0	0	-	-
RO TCB CPU time	0	0	-	-
QR TCB CPU time	0.000612	2	21%	100%
Suspend time	0.001317	2	45%	45%
Dispatch wait time	0.000238	1	6%	16%
- Bar Chart:** A bar chart at the bottom showing 'Time (seconds)' for various transactions. A callout points to a bar for 'CICS Key 8 TCB CPU time average=0.169700'.
- Outline View:** A tree view on the right showing a hierarchical structure of nodes, including 'NRK1 (1)', 'NRK3 (2)', 'NRK5 (1)', etc.

Powerful active outline view speeds selection

Flexibility in what you want to see

Drill into data files using the explorer view

..or follow Analysis Scenarios like Threadsafes to highlight issues

# CICS PA - Comparison views

**Comparison between "before" and "after" situations**

Start date	Start time	Appid	Tr...	Task ter...	Respons...	Respons...	Dispatch...	User Dis...	User Dis...	User CP...	Suspend...	Suspend...	Dispatch...
2008-03-13	14:10:00...	PDQHP20	HDBN		2	1.308100	2.010900	53	1.307600	54	0.012700	0.000500	54
2008-03-13	14:10:00...	PDQWTC1	HDBN		2	1.309100	2.011800	1	0.001100	2	0.000900	1.308000	2
2008-03-13	14:10:00...	PDQHP20	HKFM		3	0.614500	0.703700	823	0.604500	824	0.087000	0.010000	824
2008-03-13	14:10:00...	PDQWTC1	HKFM		3	0.615400	0.704500	1	0.001200	2	0.000900	0.614300	2
2008-03-13	14:10:00...	PDQDIR	H000		1	0.002300	0.002300	4	0.000900	5	0.000900	0.001300	5
2008-03-13	14:10:00...	PDQDIR	H000		1	0.002700	0.002700	1	0.000800	2	0.000600	0.001900	2
2008-03-13	14:10:00...	HELMCLK	HSS0		1	0.038600	0.038600	6	0.001100	7	0.001100	0.037400	7
2008-03-13	14:10:00...	BEERPLUM							0.006500		5.210900		116
2008-03-13	14:10:00...	BEERPLUM							0.111600		4.942800		215
2008-03-13	14:10:00...	PDQDIR							0.000700		5.077900		6
2008-03-13	14:10:00...	BEERPLUM							0.006200		3.203600		66
2008-03-13	14:10:00...	PDQDIR							0.000700		3.210300		4
2008-03-13	14:10:00...	PDQDIR							0.000600		0.267400		2
2008-03-13	14:10:00...	BEERPLUM							0.299800		0.198300		5880
2008-03-13	14:10:00...	PDQHP20	MVWQ			0.000000	0.154800			64	0.011200	0.016000	64
2008-03-13	14:10:00...	HELMCLK	NK31			0.025400	0.027100			11	0.001700	0.023400	11
2008-03-13	14:10:00...	HELMCLK	NK50			0.051700	0.051700			18	0.003000	0.047600	18
2008-03-13	14:10:00...	HELMCLK	NKR1			1.524100	1.524100			7	0.001100	1.522300	7
2008-03-13	14:10:00...	PDQVARI	OV5W		2	0.422400	0.672600	665		666	0.096600	0.012200	666
2008-03-13	14:10:00...	PDQESTE	OV72		1	0.043200	0.043200	127	0.000000	128	0.016000	0.003100	128
2008-03-13	14:10:00...	PDQESTE	OVD		2	0.316500	0.555900	304	0.306400	305	0.200800	0.010100	305
2008-03-13	14:10:00...	PDQNT	OV		1	0.021500	0.021500	1	0.000800	2	0.000700	0.020700	2

**Threadsafe (Change-TCB mode delay count average)**

Transaction ID (and r)	Time (seconds)
KWO1 (1)	0.3
HKFM (3)	0.0823
OV5W (2)	0.0661
OVDA (2)	0.0300
ZFA3 (1)	0.0180
IT4	0.0114
ER02 (2)	0.0107
65	0.0065
HDBN (8)	0.0058

**Threadsafe (Change-TCB mode delay count average)**

Transaction ID (and r)	Time (seconds)
QFOR (6)	1.2717
SUHT (12)	0.9961
KWX1 (9)	0.6605
KWO1 (6)	0.5905
KXZ5 (3)	0.5752
KXZ4 (10)	0.5520
KXZ6 (5)	0.4945
QSRS (4)	0.4524
OV46 (4)	0.3314
OV46 (1)	0.2760
QFOR (2)	0.1785

# CICS PA - Integration with CICS IA

The screenshot displays the IBM CICS Explorer interface. The main window shows a 'Response time' chart for transaction CRTP, with a y-axis labeled 'Time (seconds)' ranging from 0 to 0.0075 and an x-axis showing dates from 2007-01-11 to 2007-01-12. Below the chart, the 'Transaction detail for: CRTP' is shown, including start date, time, and application. The 'Overview' section features several gauges for Threadsafe, CPU time, Response time, Storage, and File usage. A red circle highlights the 'Performance history' menu item in the left-hand 'Programs' pane, which is open to show 'Response time' and 'CPU time' options. A red arrow points from this menu to the response time chart. Below the overview, a table titled 'Threadsafe (averages)' provides detailed performance metrics.

Measurement	Time (avg)	Count	%Overall	%Relative
Threadsafe:				
User CPU time	0.000672	2	100%	100%
CICS Key 8 TCB CPU time	0	0	-	-
J8 TCB CPU time	0	0	-	-
L8 TCB CPU time	0	0	-	-
S8 TCB CPU time	0	0	-	-
T8 TCB CPU time	0	0	-	-
X8 TCB CPU time	0	0	-	-
CICS Key 9 TCB CPU time	0	0	-	-
J9 TCB CPU time	0	0	-	-
L9 TCB CPU time	0	0	-	-
X9 TCB CPU time	0	0	-	-
Miscellaneous TCB CPU time	0	0	-	-
R0 TCB CPU time	0	0	-	-
QR TCB CPU time	0.000672	2	100%	100%

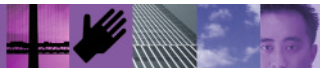
# CICS PA - Integration with CICSplex SM perspective

The screenshot displays the IBM CICS Explorer interface. On the left, a tree view shows the CICSplex structure for server IYCYZC23, including regions like TOOLPLX1 (3/4) and TSTPLEX (11/12). The central pane shows a table of CICS regions with columns for Region, Name, Status, and Use C. The region CICSC231 CRTP is selected, and a context menu is open over it, with 'Performance history' expanded and 'CPU time' highlighted. On the right, a 'CPU time' graph shows a bar chart of CPU usage over time. Below the graph, a 'Transaction detail for: CRTP' window is visible, showing an overview of performance metrics like Threadsafes, CPU time, Response time, and Storage.

Region	Name	Status	Use C
CICSC231	CPMI	✓ ENABLED	0
CICSC231	CP55	✓ ENABLED	0
CICSC231	CQPI	✓ ENABLED	0
CICSC231	CQPO	✓ ENABLED	0
CICSC231	CQRY	✓ ENABLED	0
CICSC231	CREA	✓ ENABLED	0
CICSC231	CREC	✓ ENABLED	0
CICSC231	CRMD	✓ ENABLED	0
CICSC231	CRMF	✓ ENABLED	0
CICSC231	CRSQ	✓ ENABLED	1
CICSC231	CRSR	✓ ENABLED	0
CICSC231	CRSY	✓ ENABLED	0
CICSC231	CRTE	✓ ENABLED	0
CICSC231	CRTP	✓ ENABLED	250
CICSC231	C		
CICSC231	C		
CICSC231	C		
CICSC231	C		
CICSC231	C		
CICSC231	C		
CICSC231	C		
CICSC231	C		
CICSC231	CSKP	✓ ENABLED	0
CICSC231	CSMI	✓ ENABLED	0
CICSC231	CSM	✓ ENABLED	0

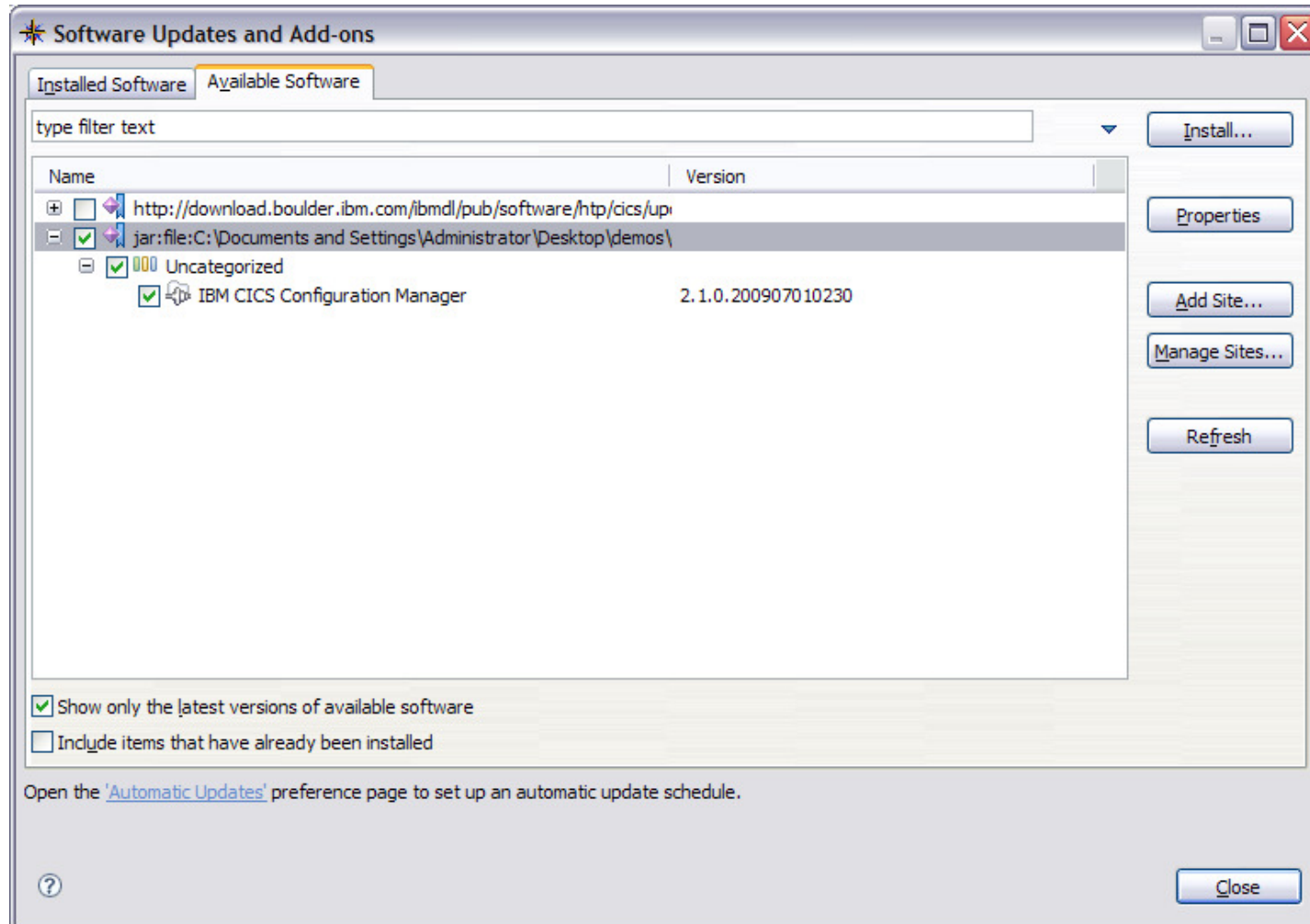
## CICS administration problems solved using CICS CM

- Working with multiple CSDs
- Working with CSD files and CICSplex SM DREPs
- Migrating changes between environments
- Delegating and approving changes
- Changes across LPAR boundaries
- Backout
- Audit compliance
- Cleanup and analysis
- Comparisons and exception analysis
- Cold start analysis

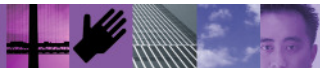




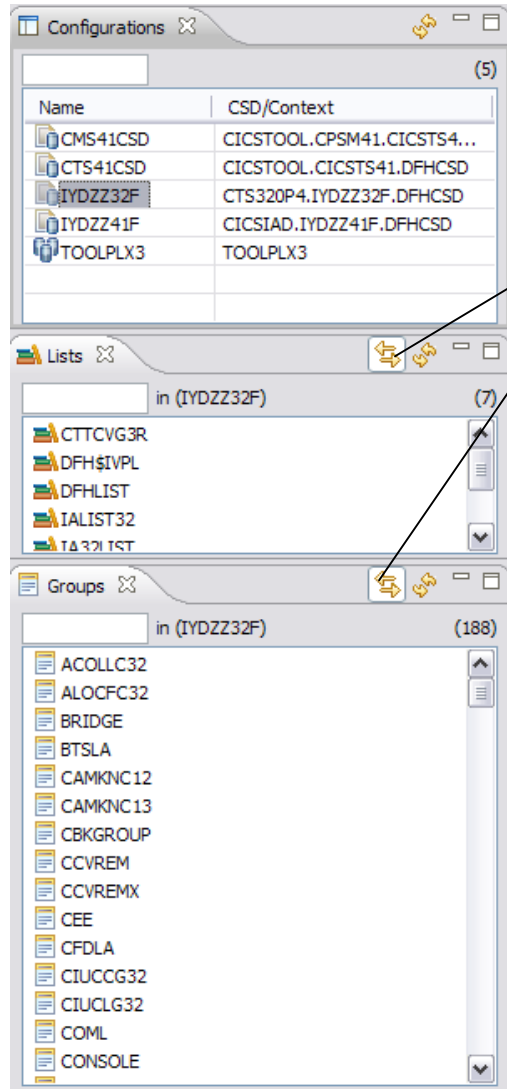
# Installation



CICS CM Explorer plug-in installs through the update site mechanism in the CICS Explorer

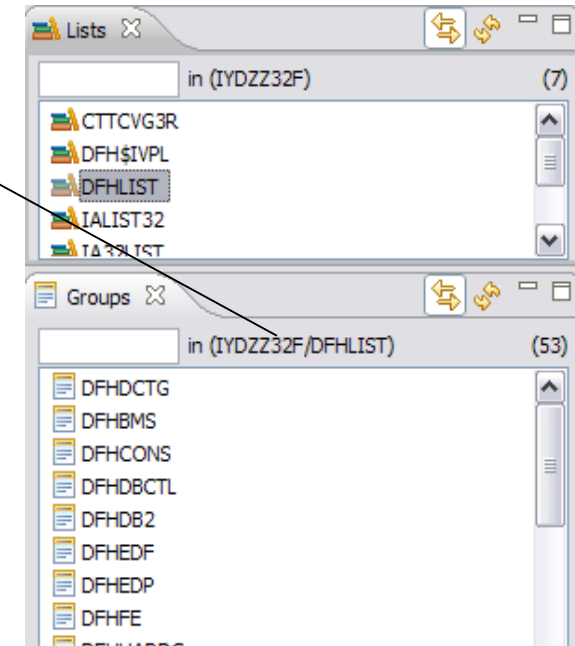


# CM - Configurations, Lists, Groups

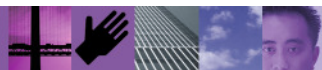


Views display configurations, lists and groups

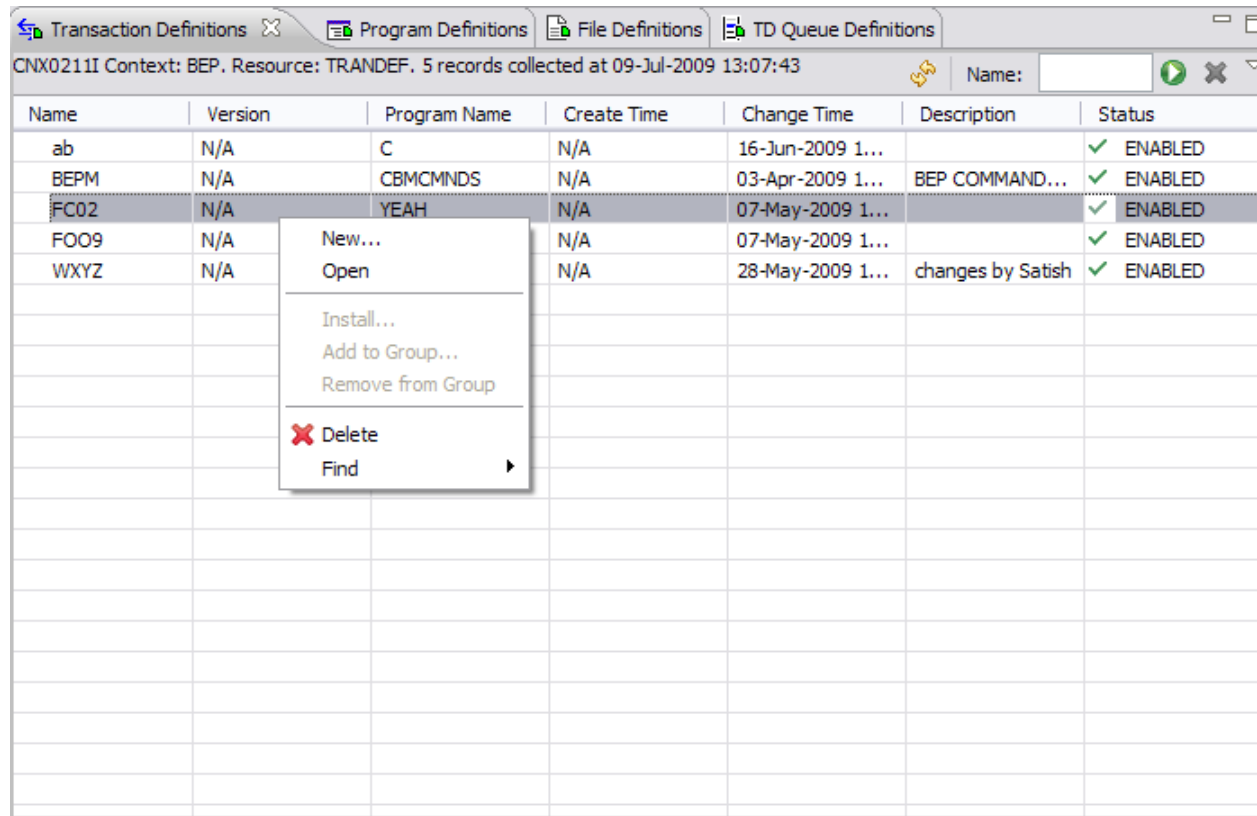
Linked to selection – the lists and groups are displayed for the currently selected configuration. Can be toggled on and off.



Groups can also be displayed for the currently selected list



# CM - Creating, editing and deleting a resource definition



Transaction Definitions | Program Definitions | File Definitions | TD Queue Definitions  
 CNX0211I Context: BEP. Resource: TRANDEF. 5 records collected at 09-Jul-2009 13:07:43

Name	Version	Program Name	Create Time	Change Time	Description	Status
ab	N/A	C	N/A	16-Jun-2009 1...		✓ ENABLED
BEPM	N/A	CBMCMNDS	N/A	03-Apr-2009 1...	BEP COMMAND...	✓ ENABLED
FC02	N/A	YEAH	N/A	07-May-2009 1...		✓ ENABLED
FOO9	N/A		N/A	07-May-2009 1...		✓ ENABLED
WXYZ	N/A		N/A	28-May-2009 1...	changes by Satish	✓ ENABLED

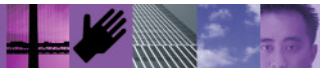
Context Menu Options:

- New...
- Open
- Install...
- Add to Group...
- Remove from Group
- ✗ Delete
- Find

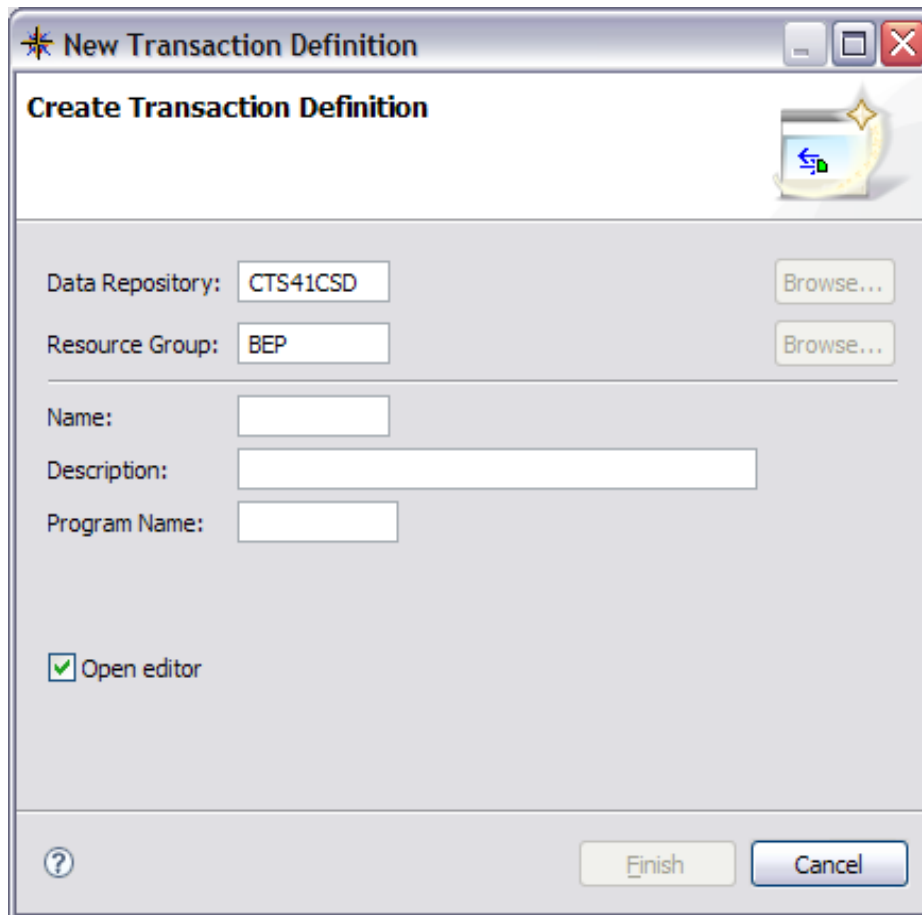
Can open a creation wizard from different paths.

Within a definitional view select the “New...” menu.

Select a group and select an option from the “New...” menu.



## CM - Creating, editing and deleting a resource definition



**New Transaction Definition**

**Create Transaction Definition**

Data Repository: CTS41CSD Browse...

Resource Group: BEP Browse...

Name:

Description:

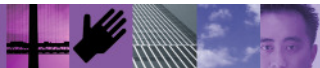
Program Name:

Open editor

Finish Cancel

Different resource types have slightly different creation wizards.

Only the basic attributes need to be entered at this point. Others are defaulted.



# CM - Creating, editing and deleting a resource definition

Transaction Definition (DEMO) X

Transaction Definition (DEMO)

**Overview**

**Basic**

Name: DEMO Description:

Version: Created:

Enabled Changed: 09-Jul-2009 13:15:05

**Details**

Initial Program:  Profile:

Task Work Area Size:

**Storage**

Clear task-lifetime storage on release to protect sensitive data

Task life-time storage can be located above 16MB Line

Isolate user-key task-lifetime storage from other tasks' user-key programs

Obtain task storage in CICS-key

**User Data**

1:  2:  3:

Overview Remote Termination Runtime Alias Recovery Attributes

Once create completes the resource is opened in an editor, where further changes can be made.

The resource has been created at this point.

These editors are the same as those used for the CICS Explorer, they inherit the validation and embedded help framework.

# CM - History

Display by date groupings

Resource History for FOO9 from earliest to latest entry

Revision Time	Resource Name/After	Resource Type/Before	Group	User Name	Command	Change P...	Scheme
Today							
2009/07/09 13:43	FOO9	TRANDEF	BEP	CICSUSER	UPDATE		
Older Than This Month							
2009/05/07 17:52	FOO9	TRANDEF	BEP	CICSUSER	CREATE		

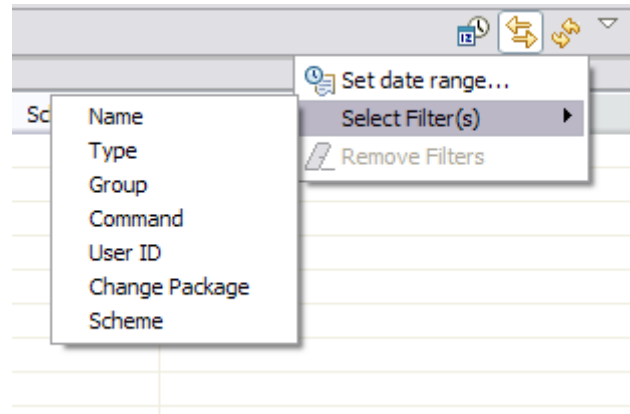
Sort by columns by clicking on column header

Resource History for BEP from 2009/04/09 13:07:41 to latest entry

Revision Time	Resource Name/...	Resource Type/Before	Group	User Name	Command	Change P...	Sch
2009/05/27 09:31:41	A	ATOMDEF	BEP	CICSUSER	DELETE		
2009/05/27 09:31:37	A	ATOMDEF	BEP	CICSUSER	CREATE		
2009/07/09 13:18:35	DEMO	TRANDEF	BEP	CICSUSER	DELETE		
2009/07/09 13:15:28	DEMO	TRANDEF	BEP	CICSUSER	CREATE		
2009/05/07 17:53:37	FC02	TRANDEF	BEP	CICSUSER	CREATE		
2009/07/09 13:43:41	FOO9	TRANDEF	BEP	CICSUSER	UPDATE		
2009/05/07 17:53:19	FOO9	TRANDEF	BEP	CICSUSER	CREATE		
2009/05/18 14:40:28	FOOOO	TCPDEF	BEP	CICSUSER	CREATE		
2009/06/05 15:27:20	J000	CONNDEF	BEP	CICSUSER	DELETE		

## CM - History

Select Filters to apply to history entries



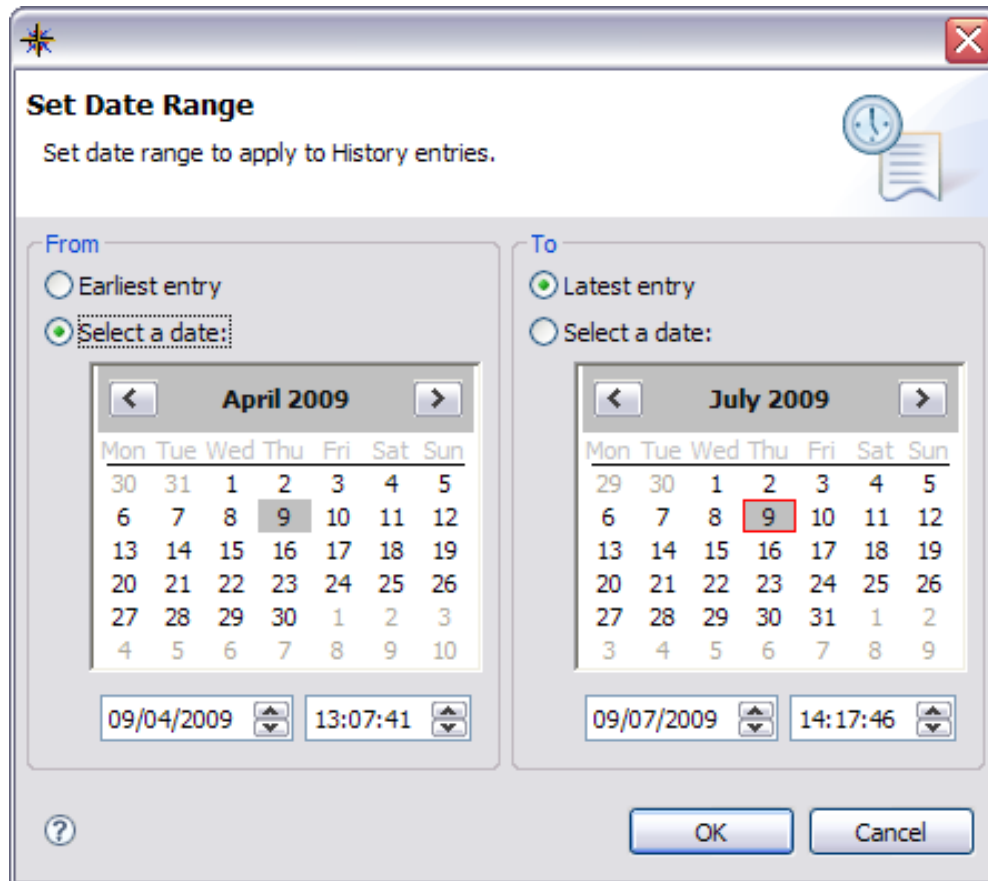
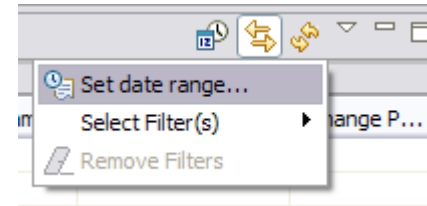
Once filters have been selected you can populate the values, choose “equals” or “not equals” and apply the filters

A screenshot of the CM History tool interface. The title bar shows 'History' and a close button. The main area displays a table of history entries for BEP from 2009/04/09 13:07:41 to the latest entry. The table has columns for Revision Time, Resource Name/After, Resource Type/Before, Group, User Name, Command, and Change P... The first entry is expanded, showing details for a resource named DEMO.

Revision Time	Resource Name/After	Resource Type/Before	Group	User Name	Command	Change P...
2009/07/09 13:15:28	DEMO	TRANDEF	BEP	CICSUSER	CREATE	

## CM - History

Set Date range to apply to history entries



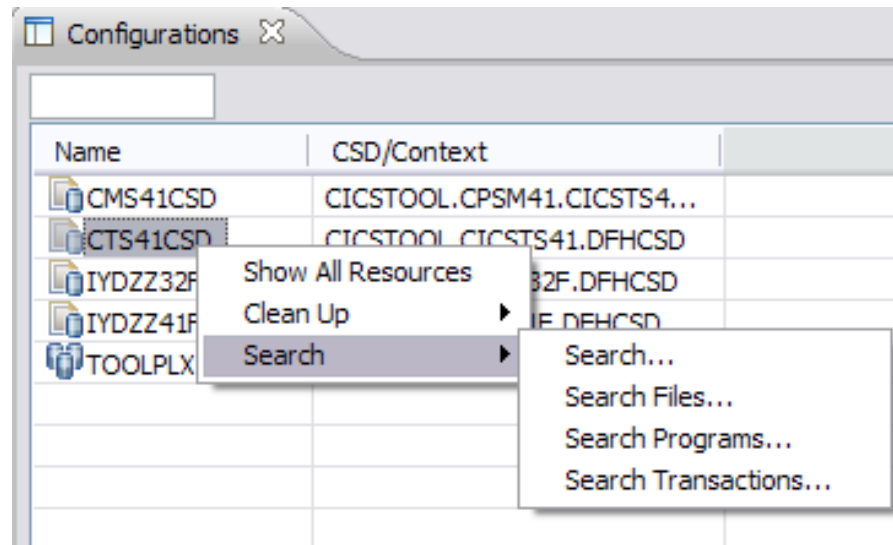
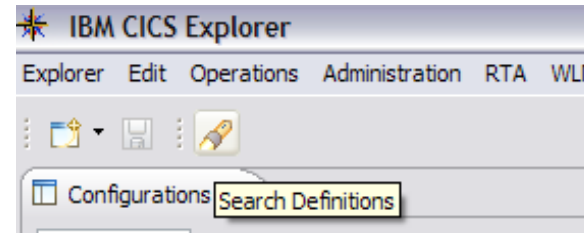
Select the range using the dialog box

This range will then be used to limit the results displayed to changes within these times

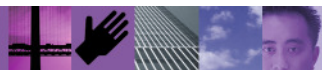


# CM - Searching

You can drive the search dialog from the toolbar



Or from one of the search options on a configuration or group



## CM - Searching

From the search dialog you can specify name, type, configurations(s) and groups within a particular configuration

The screenshot shows a dialog box titled "Search Definitions" with a close button (X) in the top right corner. Below the title bar, there is a sub-header "Search Definitions" and the instruction "Specify search criteria". A magnifying glass icon is located in the top right corner of the dialog area. The dialog is divided into two main sections: "Search" and "Filter".

**Search Section:**

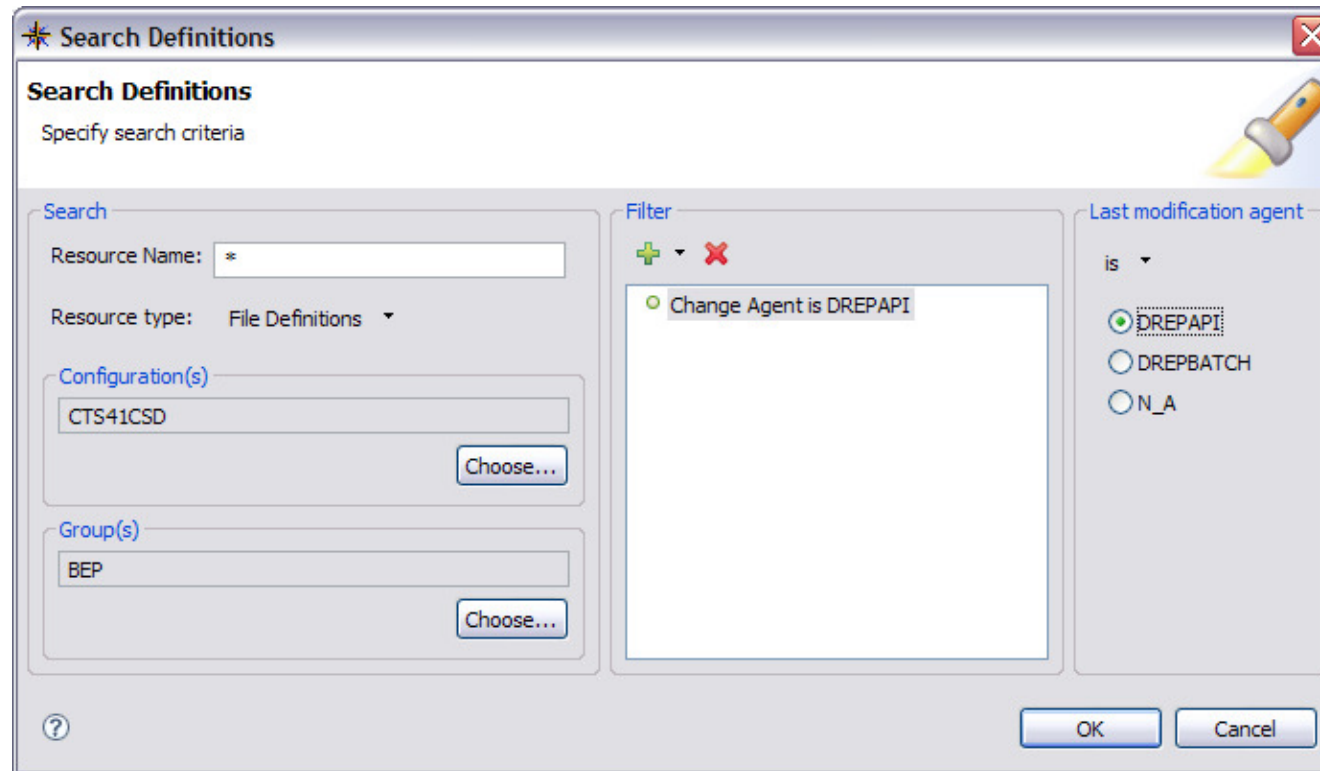
- Resource Name:** A text input field containing the asterisk symbol (\*).
- Resource type:** A dropdown menu showing the asterisk symbol (\*).
- Configuration(s):** A text input field containing "CTS41CSD" and a "Choose..." button to its right.
- Group(s):** A text input field containing "BEP" and a "Choose..." button to its right.

**Filter Section:**

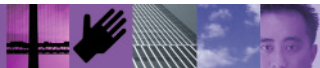
- A large empty rectangular area for defining search filters.
- At the top left of this area are a green plus sign (+), a downward arrow (v), and a red X.

At the bottom of the dialog, there is a help icon (question mark in a circle) on the left and "OK" and "Cancel" buttons on the right.

# CM - Searching

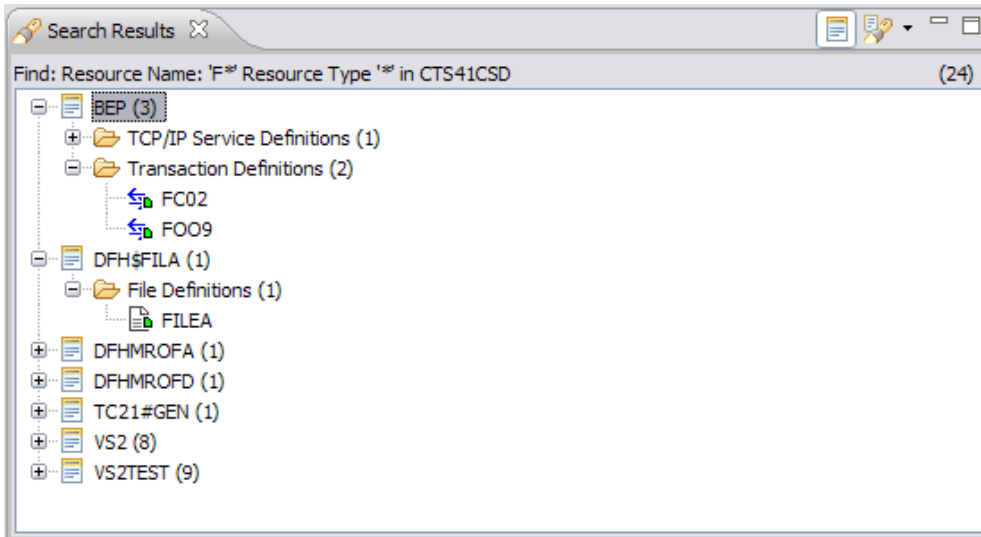
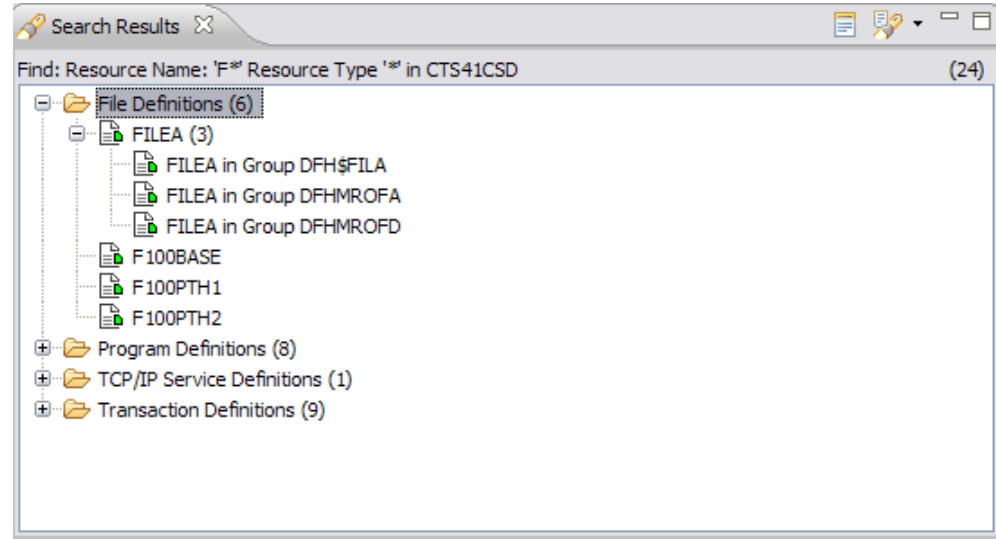


If a resource type is specified further filtering can be done on attribute values



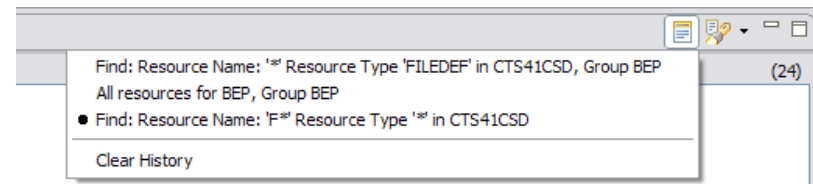
# CM - Searching

Results are displayed in the Search results view

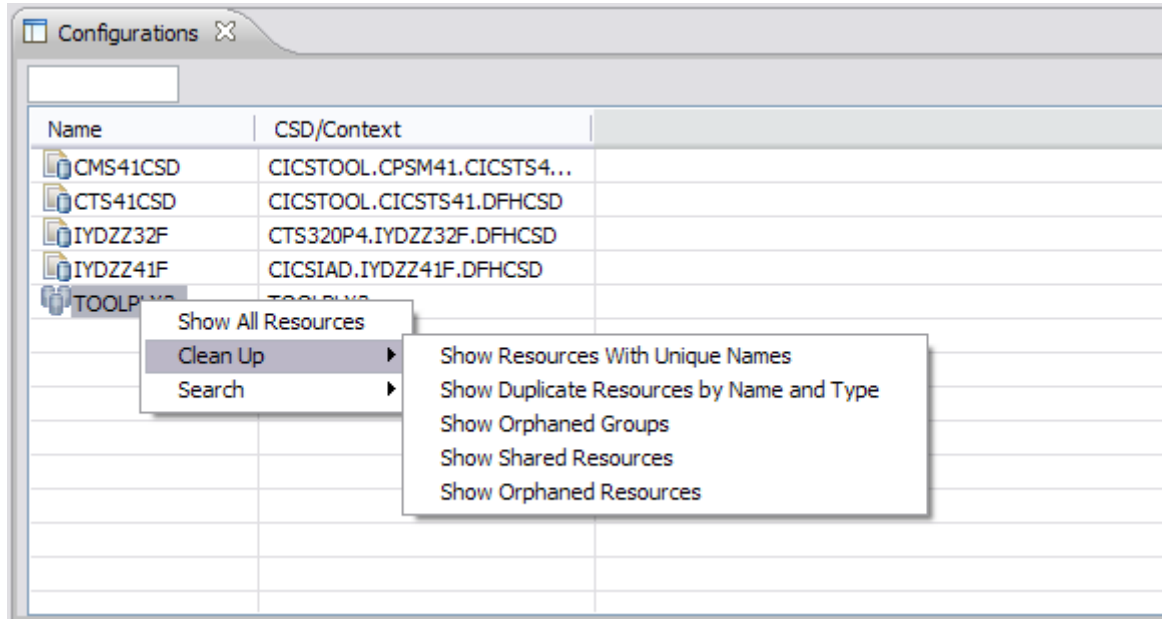


Results can be arranged by group

Result history

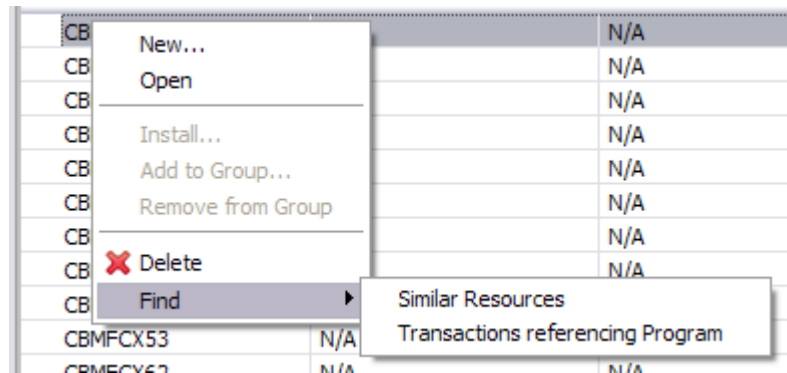


# CM - Clean Up – Specific Searches



Some searches to aid in resource and CSD clean up have been provided

Some specific searches on certain resource types:  
LSRPool  
Program



# CM - Operational Definitions

**Connections**

Connection

Type: Configuration Manager

Name: CM 2.1 Connection

Location

Host name: WINMVS2E.HURSLEY.IBM.COM

Port number: 8990

Authentication

User ID: KAT

Password: ●●●

! Saved passwords are stored on your computer in a file that is difficult, but not impossible, for an intruder to read.

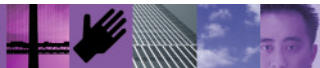
CICS Connection

Name	Type
<input checked="" type="checkbox"/> 4.1 Connection	CICS Management Interface
<input type="checkbox"/> Old data connection to 4.1	CICSplex SM Data Interface

Restore Defaults Apply

OK Cancel

You can associate a CMCI or a CICSplex SM Data connection with your CM connection, to allow management of operational resources alongside use of CM



# CM - Operational Definitions

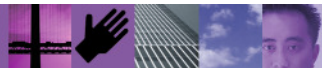
The screenshot shows the IBM CM console interface. At the top, there are tabs for Transaction Definitions, Program Definitions, File Definitions, and TD Queue Definitions. Below the tabs, there are two main panels. The top panel, titled 'CNX0211I Context: BEP, Resource: FILEDEF, 4 records collected at 09-Jul-2009 14:48:19', contains a table with columns: Name, Version, Create Time, Change Time, and De... The bottom panel, titled 'CNX0211I Context: TOOLPL...', contains a table with columns: Region, Name, status, Add, Browse, Delete, and Read. A context menu is open over the bottom panel, listing actions: New..., Open, Install..., Add to Group..., Remove from Group, Delete, and Find.

Name	Version	Create Time	Change Time	De...
ASILLY	1	N/A	01-Jul-2009 12:49:58	fdkj
FC02		N/A	08-May-2009 09:10:52	
TESTDIS		N/A	11-May-2009 12:20:05	
UNITTEST		N/A	11-May-2009 17:10:33	

Region	Name	status	Add	Browse	Delete	Read
CICSC141	ACCTFIL		ADDABLE	NOTBROW...	DELETABLE	READABLE
CICSC141	ACCTFIL@	✓ ENABLED CLOSED	ADDABLE	NOTBROW...	DELETABLE	READABLE
CICSC141	ACCTNAM	✓ ENABLED OPEN	NOTADDA...	BROWSABLE	NOTDELET...	READABLE
CICSC141	ACCUNTD	✓ ENABLED OPEN	NOTADDA...	NOTBROW...	NOTDELET...	READABLE
CICSC141	ACINUSE	✓ ENABLED CLOSED	ADDABLE	BROWSABLE	DELETABLE	READABLE
CICSC141	BRQFILOD	✓ ENABLED CLOSED	ADDABLE	NOTBROW...	NOTDELET...	READABLE
CICSC141	CIUCNTL	✓ ENABLED CLOSED	ADDABLE	BROWSABLE	DELETABLE	READABLE
CICSC141	CIUINT1	✓ ENABLED CLOSED	ADDABLE	BROWSABLE	DELETABLE	READABLE
CICSC141	CIUINT2	✓ ENABLED CLOSED	ADDABLE	BROWSABLE	DELETABLE	READABLE

This enables you to manage any regions connected to the WUI server and install CICSplex SM definitions into those regions



# CICS TG in CICS Explorer

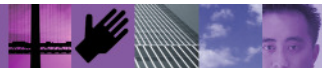
The screenshot displays the IBM CICS Explorer interface. The left pane shows a tree view of CICSplex resources for server IYCWJFW1, including DUMMY907 (0/0) and various L830PLEX and L918PLX resources. The main pane shows a table of Gateway daemons for scope DUMMY907, with 8 records collected at 24-Apr-2009 10:29:22. The table lists gateway names, their status (all RUNNING), versions, gateway IDs, netnames, up times, health (all 100), max pipes (all 250), in-use pipes (all 0), hostnames (all WINMVS24), TCP ports, and client counts (all 0).

Name	Status	Version	GatewayID	Netname	UpTime	Health	MaxPl...	InUse...	Hostname	TCP	Clients
CTGRED1	RUNNING	7.2.0.0	MV24.CTGRED1	RED1EXCI	3 days 18:09:30	100	250	0	WINMVS24	4148	0
CTGRED2	RUNNING	7.2.0.0	MV24.CTGRED2	RED2EXCI	3 days 17:57:52	100	250	0	WINMVS24	4150	0
ANS720	RUNNING	7.2.0.0	SMITHSON.GATEWAY	CTGEXCI	17 days 21:07:30	100	250	0	WINMVS24	6483	0
ANS720A	RUNNING	7.2.0.0	SMITHSON.CTG720A	CTGEXCI	17 days 21:07:49	100	250	0	WINMVS24	6485	0
ANS710	RUNNING	7.1.0.0	-	-Generic-	14 days 22:53:25	100	250	0	WINMVS24	6486	0
ANS710A	RUNNING	7.1.0.0	710A	-Generic-	17 days 21:07:45	100	250	0	WINMVS24	6487	0
CTGBLU1	RUNNING	7.2.0.0	MV24.CTGBLU1	-Generic-	3 days 17:57:57	100	250	0	WINMVS24	4149	0
CTGBLU2	RUNNING	7.2.0.0	MV24.CTGBLU2	BLU2EXCI	3 days 17:58:13	100	250	0	WINMVS24	4151	0

The Properties pane below the table shows details for the selected gateway daemon (CTGRED1):

Property	Value
Gateway daemon	
Default	IY24CTGU
GatewayID	MV24.CTGRED1
Health	100
InUsePipes	0
MaxPipes	250
Name	CTGRED1
Netname	RED1EXCI
Platform	z/OS
Status	RUNNING
UpTime	3 days 18:09:30
Version	7.2.0.0
Network details	
Clients	0
Hostname	WINMVS24
SSL	-
TCP	4148

CICS Explorer SupportPac: <http://www-01.ibm.com/support/docview.wss?rs=9&context=SSGMJ2&dc=D400&uid=swg24022354>





# Impact 2010 Highlights for System z

## An enhanced Smart SOA and BPM Technology Program:

200+ client speakers, 50 Birds of a Feather sessions, & free certification testing

- 50 explicitly System z sessions scheduled , 15% of the Technology Program
- CICS specific sub-track – 35 sessions including 2 client sessions
- Broad System z coverage – additional 16 sessions
  - ▶ 1 client sessions, 1 BP session and 1 Cross-brand exec
- In the Business Program, 1 client WebSphere exec session
- System z Roadmap & flyers will provide the visibility

## A new Product Technology Center offering:

Open labs, tech zones, and product demos

- System z Solution Suite for a Smarter Planet
- Business Partner Café – System z table

## A state-of-the art Solution Showcase Center:

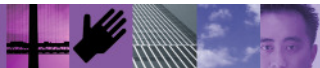
- 17 Impact partners are z, 2 Gold and 6 Silver sponsors
- zZone – features IBM & 8 partners, 7 confirmed, 1 pending
  - ▶ Prime location at entrance to the expo floor
  - ▶ System z Hardware and pedestal
  - ▶ zZingo card – driving ped attendance with “benefits”
- System z Tour

## System z unique offerings:

- System z Software Reception on Sunday Evening
- System z Solution Suite: Ask z Experts on Wednesday evening
- STG GM for System z, Tom Rosamilia will be on site, speaking and available for client meetings

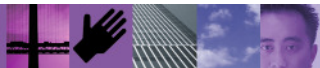


<http://www-01.ibm.com/software/websphere/events/impact/>



## The Objectives of CICS Smart Seminars

- The CICS Seminar program presents to customers, at their site, a customised technical agenda of CICS TS and CICS Tools delivered by CICS Technical specialists.
- Convey our CICS family message and strategy to a wide audience and skill set (AD & System Programmers, Architects etc) at customers own location ensuring the customer incurs no travel and lodging costs.
- Obtain customer testimonies and references in support of the SOA capabilities of the latest CICS release.
- Develop new workload on CICS; show customers how they can use the new features in the latest release to take advantage of their existing solutions and investments and ensure their short term and long term plans can reflect these capabilities.
- Send a note to [cicssem@uk.ibm](mailto:cicssem@uk.ibm) or contact your Sales Representative to nominate yourself and construct a customised agenda to you requirements



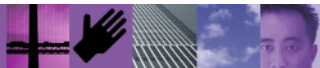
## CICS Development Technical Services

Helping to solve Business Problems and exploiting new Business Opportunities

**Engage the Hursley development team to ensure that you get the maximum value from your CICS investments.**

**Consultants are now available via a funded services engagement directly from CICS development providing a complete range of CICS services - no one has more experience!**

- System Health Check
  - ▶ How can you be sure that your CICS environment is running optimally? Be sure that your CICS environment is in the best of health and delivers maximum value to you
- Upgrade Services
  - ▶ Do you want to improve your competitive edge by offering new CICS services? Exploit new CICS features such as: Web services, IP connectivity, CICS Explorer, Event Processing, Web 2.0, Atom Feeds and PHP scripting in CICS



## CICS Development Technical Services

Helping to solve Business Problems and exploiting new Business Opportunities

### ■ Security and Governance

- ▶ Worried about your CICS security? Standards, regulatory compliance and policies getting you down? This services helps you assess and ensure the security and compliance of your CICS assets.

### ■ Performance Optimization

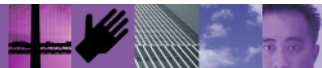
- ▶ Is your goal to maximize your performance and minimize your costs? We review CICS performance data from SMF records and/or CICS tooling to provide tuning recommendations and Capacity Planning advice

### ■ Web Services Enablement

- ▶ Need to unlock and modernize your CICS assets for SOA exploitation? We provide education and implementation for CICS Web services support including Rational Developer for z tooling. We can help with identifying assets for re-use in an application and legacy modernization project

### ■ Integration and Connectivity

- ▶ Interested in lowering complexity? Need to connect CICS with WebSphere using the latest technologies? We provide consultancy for migration from SNA to IP connectivity as well as using connection technologies such as the CICS Transaction Gateway and Web services to provide the availability of your CICS business assets to a wider audience in an SOA



## CICS Development Technical Services

Helping to solve Business Problems and exploiting new Business Opportunities

- Systems Management

- ▶ Concerned about the availability of your CICS environment? Our Systems Management offering is aimed at ensuring that your CICS environment is being managed to Best Practice standards. Improve your service levels and lower your costs

- Event Processing

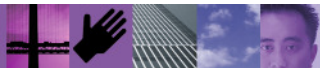
- ▶ Respond more quickly to business opportunities without changing your existing CICS application code. CICS Event Processing also helps you with regulatory compliance and Service Level Agreement monitoring through Business Dashboards and Key Performance Indicators. This offering helps you integrate your CICS environment into an Event Processing framework.

- Customized Workshops

- ▶ Skills issue? Need the best CICS product and solution training? Ensure the effective transfer of CICS best practices to the next generation of IT Staff. We offer Customized Workshops to meet your education needs for the CICS Family of products. These workshops are staffed by senior CICS developers and can be run either at your location, or at an IBM location that meets with your preference.



- For further information please contact: [CICSSTS@uk.ibm.com](mailto:CICSSTS@uk.ibm.com)



# CICS Communities and Information

[zSeries  
PD/CICS/Icing  
Sales - CICS  
Communities](#)

- **CICS Transaction Server V4.1**
  - ▶ <http://ibm.com/cics/tserver/v41/>
- **[CICS Explorer home page](#)**
  - ▶ Remember this link [ibm.com/cics/explorer](http://ibm.com/cics/explorer)
- **[CICS Explorer Forum](#)**
  - ▶ <http://tinyurl.com/68bndw>
  - ▶ IBM developerWorks forum with FAQs, Links and resources, ISV Contributions, etc. Ask questions, suggest improvements, report problems, chat
- **New! CICS Hub on the Rational COBOL Café**
  - ▶ <http://ibm.com/software/rational/cafe/community/cobol/cics>
- **Twitter - Subscribe to the [IBM System z channel](#) & [CICSfluff](#) channel to get CICS news flashes**
- **CICS Blog - Comment and opinion at [TheMasterTerminal.com](http://TheMasterTerminal.com)**
- **[CICS eNews](#) - Subscribe for news about CICS and related products**
- **[CICS Links](#) regular updates all in a single presentation deck**
- **YouTube channels**
  - ▶ [CICS Explorer](#) - Videos, demos and other cool stuff
  - ▶ [CICSFluff](#) - Other CICS videos

