

CICS Configuration Manager V1.1

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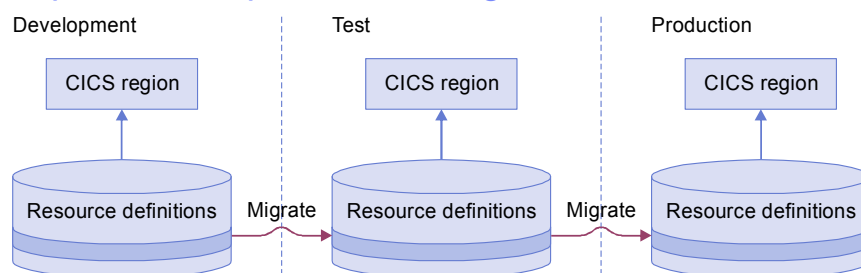
What's the problem?

- Configuring CICS systems consists of
 - ▶ Server configuration
 - ▶ Resource provisioning
 - ▶ Application deployment
- All three require creation/modification of CICS resource definitions
- Definitions must be migrated from development, to test, to production environments
- Topology of CICS regions can be complex; different topologies in each environment can require changes to the definitions
- Definitions can be stored in CSD files or CICSplex SM data repositories

Server configuration, resource provisioning and application deployment

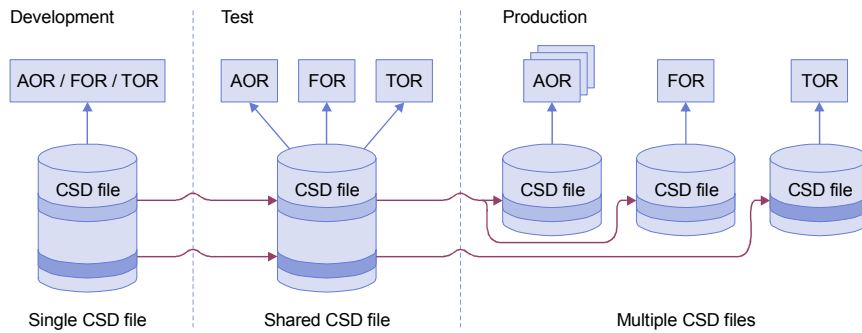


Simplistic example: 3 CICS regions



- Three sets of definitions to manage
- Two migrations per change:
Development → Test, then Test → Production
- Real-life environments are much more complex...

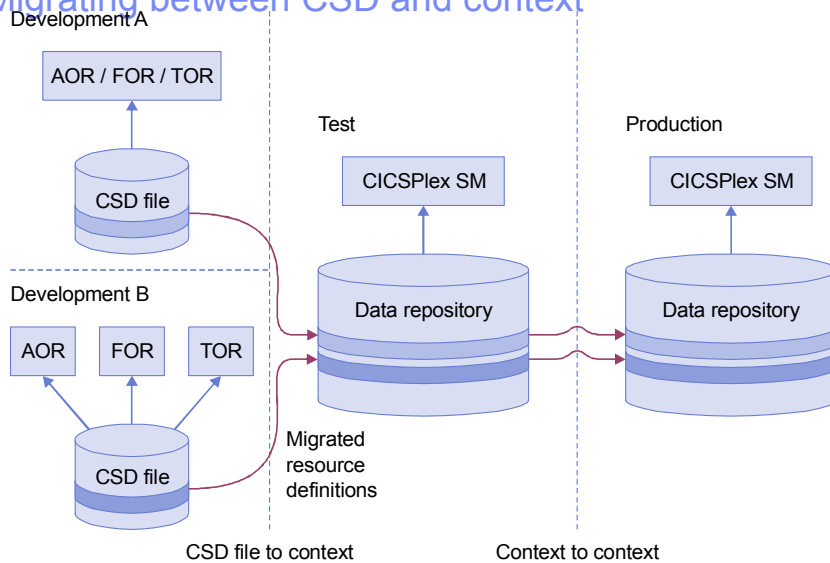
Migrating between shared and unshared CSD files



- How do you systematically manage this migration?
- If you also use CICSPlex SM for some environments, it gets more complex...



Migrating between CSD and context



Other issues

- What if definitions are intentionally different in each environment? Do you edit them separately?
 - ▶ e.g. different high-level qualifiers: DEVT., TEST., PROD..
- Need separate tools for CSD files and CICSPlex SM?
- How do you back out a change?
- How do you record changes, for auditing?
- How do you avoid promoting unexpected changes made by another user?
- How do you compare resource definitions?
- Who approves the migration?
- How do you know which definitions are still needed?
- Have you got duplicates, missing definitions?
- I can migrate to CSD to BAS using the provided extract facility
- I can't move from BAS back to CSD with CPSM facilities directly



Requirements

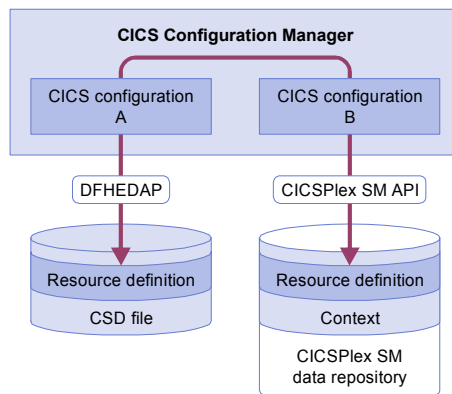
- **Managers** need to control, approve, and audit how definitions are migrated
- **Technical staff** need an easy-to-use and flexible tool to update and migrate definitions, undo migrations, investigate what they currently have, and report to management

CICS Configuration Manager provides all this and more...



The solution: CICS Configuration Manager

Abstracting the backend database



- CICS RDO uses CSDs
- CICSplex SM uses DREPs and contexts
- CICS CM abstracts these as a **CICS Configuration**
- For each CSD file or CICSplex SM context, you define a **CICS configuration**
- Thereafter, you refer only to the **CICS configuration**;
 - CICS Configuration Manager **transparently** handles the differences

CEDA

```

define prog
OVERTYPE TO MODIFY
CEDA DEFINE PROGRAM(          )
PROGRAM      ==>
GROUP        ==>
DESCRIPTION  ==>
LANGUAGE     ==>          CObol | Assembler | Le370 | C | Pli
RELOAD       ==> No       No | Yes
RESIDENT     ==> No       No | Yes
USAGE        ==> Normal   Normal | Transient
USELPACOPY   ==> No       No | Yes
STATUS       ==> Enabled  Enabled | Disabled
RS1          : 00         0-24 | Public
CEDF         ==> Yes      Yes | No
DATALOCATION  ==> Below    Below | Any
EXECKEY     ==> User      User | Cics
CONCURRENCY  ==> Quasirent Quasirent | Threadsafe
API          ==> Cicsapi   Cicsapi | Openapi
REMOTE ATTRIBUTES
+ DYNAMIC    ==> No       No | Yes
MESSAGES: 2 SEVERE
SYSID=ZCGF APPLID=IYCWZCGF

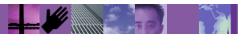
PF 1 HELP 2 COM 3 END          6 CRSR 7 SBH 8 SFH 9 MSG 10 SB 11 SF 12 CNCL

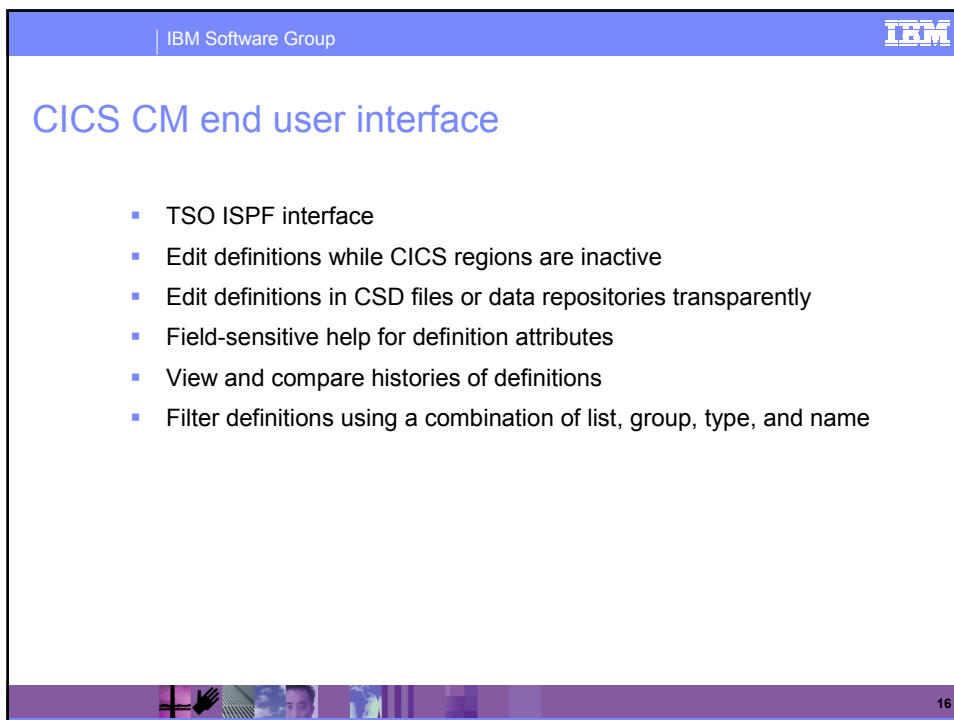
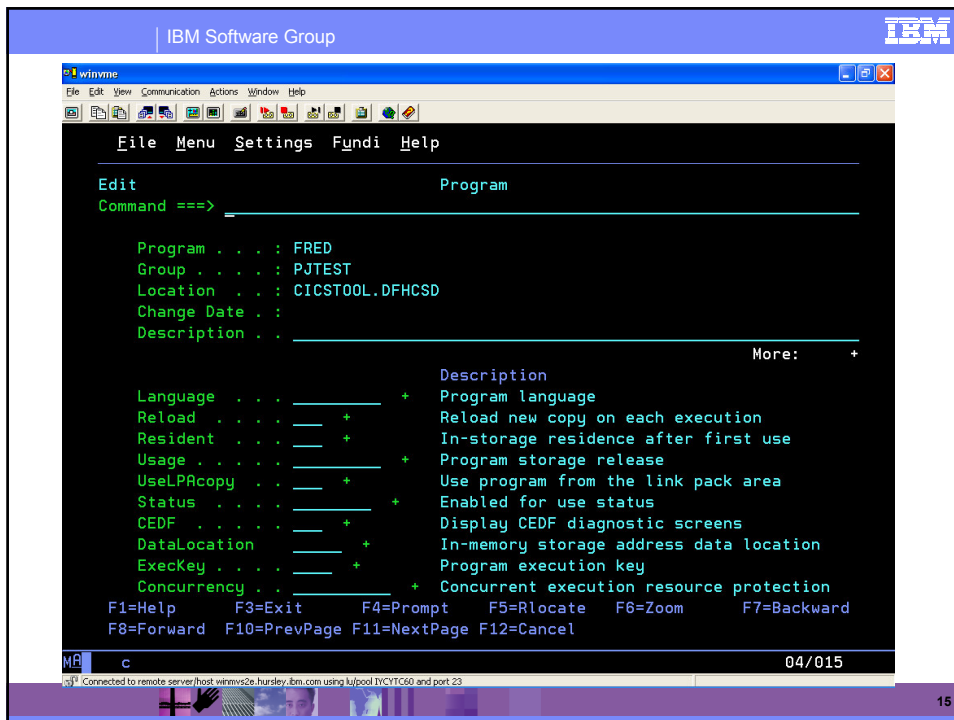
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CICS Configuration Manager

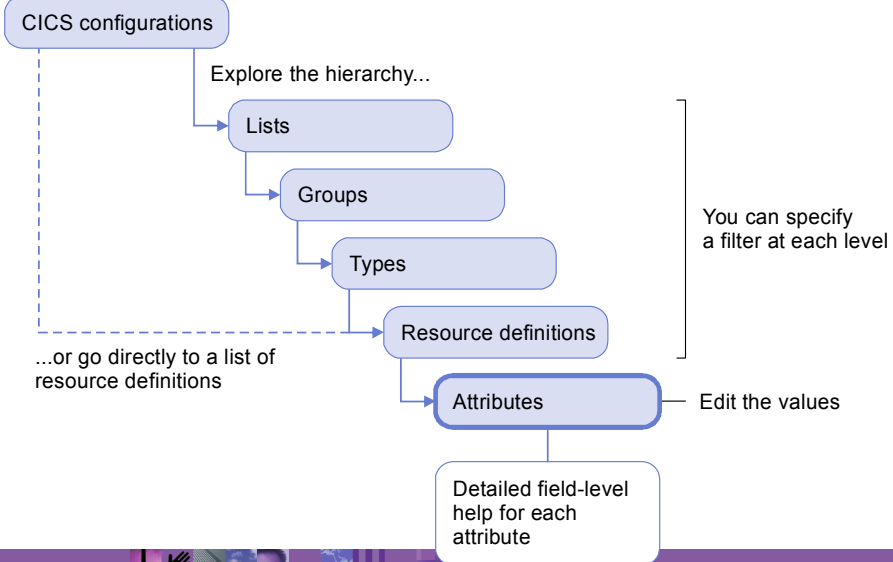


```
File Menu Fundi Help
-
R      CICS Definitions
C      DEFINE Confirmation
F      Enter details and press Enter to define new resource
/      => PAGE
*      CICS resource type . . . _____ +
      ed ----
      *****
      New definition details
      Name . . . _____
      Group . . . _____ PJ* +
      CICS Configuration . . . CICS1 +
      Model definition details (optional)
      Name . . . _____
      Group . . . _____ PJ* +
      CICS Configuration . . . CICS1 +
      F1=Help   F3=Exit   F4=Prompt   F6=Resize   F7=Backward
      F8=Forward F12=Cancel
      F1=Help   F3=Exit   F4=Prompt   F5=Rlocate   F6=Zoom   F7=Backward
      F8=Forward F12=Cancel
MH c 07/031
[+] Connected to remote server/host winvms2a.hursley.ibm.com using lu/pool.IVYTC60 and port 23
```





Navigation



Primary menu

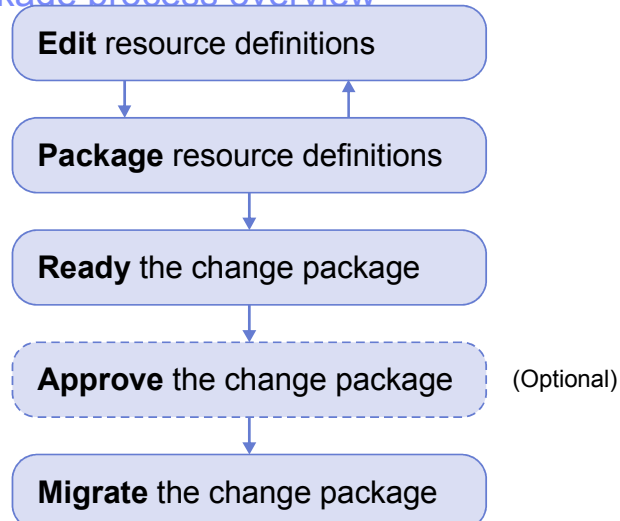
```
File Menu Help
-----
CICS Configuration Manager - Primary Menu
Option ==>> | More: +
0 Settings          Set user parameters and options
1 Administration    Administer CICS Configuration Manager definitions
2 CICS Resources    Maintain CICS resource definitions
3 Change Packages   Process change packages to migrate CICS resource
4 Reporting         Report CICS resource definitions
X Exit             Exit CICS Configuration Manager
```

04/014

Gaining more control over movement of definitions

- So far we can manipulate definitions and report on them at will
- We can also gain more control on the movement of definitions through
 - Packages
 - What to move
 - Migration schemes
 - Source and target configurations
 - Transformation rules
 - How attributes are to be transformed
 - Approval processing
 - Approval processing prior to migrate
 - Migrate/Backout commands
 - Cause the changes to occur
- Migration schemes, transformation rules and approval profiles are defined by the system programmer
- Packages are defined by the developer and processed by the system programmer

Change package process overview



Detecting unexpected changes

- CICS Configuration Manager, CICSplex SM and base RDO facilities can coexist
 - ▶ Allows for emergency changes
 - ▶ Opens possibility of changes occurring under CICS CM
- Before migrating, you marked a change package as “**ready**”, indicating you wanted no further edits
- CICS Configuration Manager automatically detects changes to the “ready” definitions
- If the “ready” definitions are different, the migration is not allowed
- Protects you from migrating unexpected changes



Batch command interface

- Allows you to integrate the change package functions of CICS Configuration Manager with change control products (such as SCLM)
- Offers a subset of CICS Configuration Manager functions: APPROVE, BACKOUT, DISAPPROVE, INSTALL, MIGRATE, READY, UNREADY
- Packages previously approved can therefore be physically moved under job scheduler, jobstep control



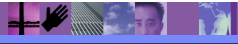
Summary

For managers

- Groups CICS resource definition changes into change packages
- Uses approval profiles to control who must approve a change package
- Uses migration schemes to control which CICS regions a change package affects
- Keeps detailed audit logs in journal

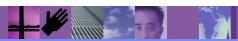
For technical staff

- Work with definitions in CSD files or CICSplex SM contexts transparently
- Edit definitions using TSO/ISPF panels:
 - Whether CICS regions are active or inactive
 - Better usability than CEDA and WUI panels
 - Context-sensitive help for attributes
- Migrate definitions between multiple CICS regions with a single command
- Back out migrations with a single command



For technical staff

- Transform definitions during migration
- Ready processing: detect unexpected changes in definitions prior to migration
- Compare historical versions of definitions, or current definition values in different configurations



For technical staff

- Online reports show:
 - Definition values across multiple CICS configurations
 - Definitions that refer to specified objects, such as:
 - Transactions that use a specified program
 - Terminals of a specified type
- Batch command interface



Availability

- Generally available 29 April 2005
 - IBM CICS Configuration Manager for z/OS Version 1 Release 1
 - Product number 5697-I78
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