

# **z/OSMF Software Deployment Application- User Experience Enhancement Update**

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Session Number 11697**



# Agenda

## ■ Recent Enhancements

- Support for unmounted z/OS UNIX file system data sets
- Support for deployment configuration copy
- Support for granular control over which users can view and modify deployment task artifacts

## ■ New Planned Enhancement

- Software Management

## ■ Backup

- Software Deployment Hints and Tips

## NEW FUNCTION – PTFs UK73699 and UO01300



### ■ Support for Unmounted z/OS UNIX File System Data Sets

- Currently UNIX file system data sets must be mounted so the Deployment task of z/OSMF can find the data sets where directories defined by DDDEF entries reside.
- If a data set cannot be found for one or more directories because the data set is not mounted, then the Deployment task generates an error message to identify the directory and does not continue the deployment operation.
- **Now the user will be given the opportunity to identify the data sets that contain the subject directories.**

# Configure Deployment Wizard ...

**New step in configure deployment wizard**

**Directories for which data sets could not be obtained**

Log out IBM

Welcome x Deploy

Deployment > Deploy Software > Install > Configure Deployment

Configure Deployment Kathy's Missing MP SWI

UNIX File System Data Sets

The UNIX file system data sets that contain the directories listed in the UNIX directories field could not be found because they are not mounted. Use the Add action to specify the name of those data sets and to identify the mount points that would make the directories accessible. To proceed, a dataset and mount point must be specified for each UNIX directory.

Source software instance: Kathy's Missing MP SWI on system LOCAL  
Target system: LOCAL

▼ Unmounted Directories for Kathy's Missing MP SWI on system LOCAL

UNIX File System Data Sets

Data Set Name Filter	Mount Point Filter
Total: 0	

UNIX directories:

```
/service/usr/lpp/blz/sbla001/IBM/
/service/usr/lpp/blz/sbla002/IBM/
```

< Back Next > Finish Cancel

If a data set cannot be determined because a directory is not mounted or cannot be found, the user will be given the opportunity to supply the mount point and the UNIX file system data set. The deployment will not proceed until the user provides the data set for the mount point or the directory is mounted so that the data set can be determined.



# Configure Deployment Wizard ...

Welcome zosmf8 Log out IBM

Welcome Deployment

Deployment Deployment

Configure Deployment

By selecting Add, you can enter mount point information

UNIX File System Data Sets

The UNIX file system data sets that contain the directories listed in the UNIX directories field could not be identified because they are not mounted. Use the Add action to specify the dataset and mount point to identify the mount points that would make the directories accessible to SMP/E. To proceed, a dataset and mount point must be specified for each UNIX directory.

Source software: Kathy's Missing MP SWI on system LOCAL  
Target system: LOCAL

Unmounted Directories for Kathy's Missing MP SWI on system LOCAL

UNIX File System Data Sets

Mount Point

UNIX directories:

/service/usr/lpp/blz/sbla001/IBM/  
/service/usr/lpp/blz/sbla002/IBM/

< Back Next > Finish Cancel

On the right you can see the directories for which z/OS UNIX file system data sets could not be obtained. By selecting the Add Action, the user can enter the mount point information.



# Configure Deployment Wizard ...



Welcome zosmf8 Log out IBM

Welcome Deployment

Deployment > Deploy Software > Deployment Checklist > Configure

## Add UNIX Data Set and Mount Point

Specify a UNIX file system data set name and mount point that makes the data set accessible to SMP/E. The mount point must have a prefix for one or more of the listed UNIX directories. z/OSMF uses the mount point to identify the directories contained in the data set. z/OSMF does not mount the data set.

Software instance: Kathy's Missing MP SWI

\* UNIX file system data set name:  
SMPTEST.MIG2.VL144B

\* Mount point:  
/service/usr/pp/blz/sbla001

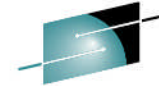
UNIX directories:  
/service/usr/pp/blz/sbla001/IBM/  
/service/usr/pp/blz/sbla002/IBM/

OK Cancel

**Enter the z/OS UNIX file system data set name and mount point**

The user can enter the Unix file system data set and the mount point.

# Configure Deployment Wizard ...



Welcome zosmf8 Log out IBM

Deployment Deployment Checklist Configure Deployment

## Configure Deployment for Kathy's Missing MP SWI

☒ Welcome
 ☒ DLIBs
 ☒ Model
 **→ UNIX File System Data Sets**
 SMP/E Zones
 Data Sets
 Catalogs
 Volumes and Storage
 Classes
 Mount Points

### UNIX File System Data Sets

The UNIX file system data sets that contain the directories listed in the UNIX directory. Specify the name of those data sets and to identify the mount points that would make the directories accessible. To proceed, a dataset and mount point must be specified for each UNIX directory.

Messages 0 0 1 Close All  
 Oct 19, 2011 8:53:51 AM

Source software instance: Kathy's Missing MP SWI on system LOCAL  
 Target system: LOCAL

▼ Unmounted Directories for Kathy's Missing MP SWI on system LOCAL

UNIX File System Data Sets

Data Set Name	Mount Point	Messages
<input checked="" type="checkbox"/> SMPTEST.MIG2.VL144B	/service/usr/lpp/blz/sbla001	

Total: 1, Selected: 1

UNIX directories:  
 /service/usr/lpp/blz/sbla002/IBM/

< Back Next > Finish Cancel

Mount point assigned to a z/OS UNIX file system data set

Upon return from adding a mount point, you can see that one has been resolved. The user would again use the Add Action to resolve the second missing Unix directory.

# Configure Deployment Wizard ...



Log out

IBM

Welcome x Deployment x

Deployment > Deploy Software > Deployment Checklist > Configure Deployment

Configure Deployment for Kathy's Missing MP SWI

Help

☒ Welcome  
☒ DLIBs  
☒ Model  
☒ **UNIX File System Data Sets**  
 SMP/E Zones  
 Data Sets  
 Catalogs  
 Volumes and Storage  
 Classes  
 Mount Points

**UNIX File System Data Sets**

The UNIX file system data sets that contain the directories listed in the UNIX directory ... not be identified because they are not mounted. Use the Add action to specify the name of those data sets and to identify the mount points that would make the ... accessible to SMP/E. To proceed, a dataset and mount point must be specified for each UNIX directory.

Messages 0 0 2 Close All  
 IZUD593I: 1 UNIX directories were assigned to data set "SMPTEST.MIG2.VL144B". Oct 19, 2011 8:53:51 AM x  
 IZUD593I: 1 UNIX directories were assigned to data set "PINTO.VICOM.JCL". Oct 19, 2011 8:56:04 AM x

Source software instance: Kathy's Missing MP SWI on system LOCAL  
Target system: LOCAL

▼ Unmounted Directories for Kathy's Missing MP SWI on system LOCAL

UNIX File System Data Sets

Data Set Name	Mount Point	Messages
<input type="checkbox"/> SMPTEST.MIG2.VL144B	/service/usr/lpp/blz/sbla001	
<input checked="" type="checkbox"/> PINTO.VICOM.JCL	/service/usr/lpp/blz/sbla002/IBM	

Total: 2, Selected: 1

< Back **Next >** Finish Cancel

UNIX directories:

All mount points are resolved,  
configuration can continue

After all mount points have been resolved, clicking Next will proceed through the Configuration process as normally done. If errors result from the mount points entered by the user, control will remain on this pane until the errors are resolved.



## NEW FUNCTION – APAR PM40764 and IO14873



### ■ Support for Deployment Configuration Copy

- Currently when creating a deployment operation in the Deployment task of z/OSMF, the configuration to describe the target software instance must be specified from scratch.
- A better solution is to allow a user to reuse the configuration information from a prior completed deployment operation.
  - Allows the user to reuse all the mappings from a prior deployment
  - User can also model after another current software instance
  - Simplifies the deployment, similar to using an existing configuration during a ServerPac install

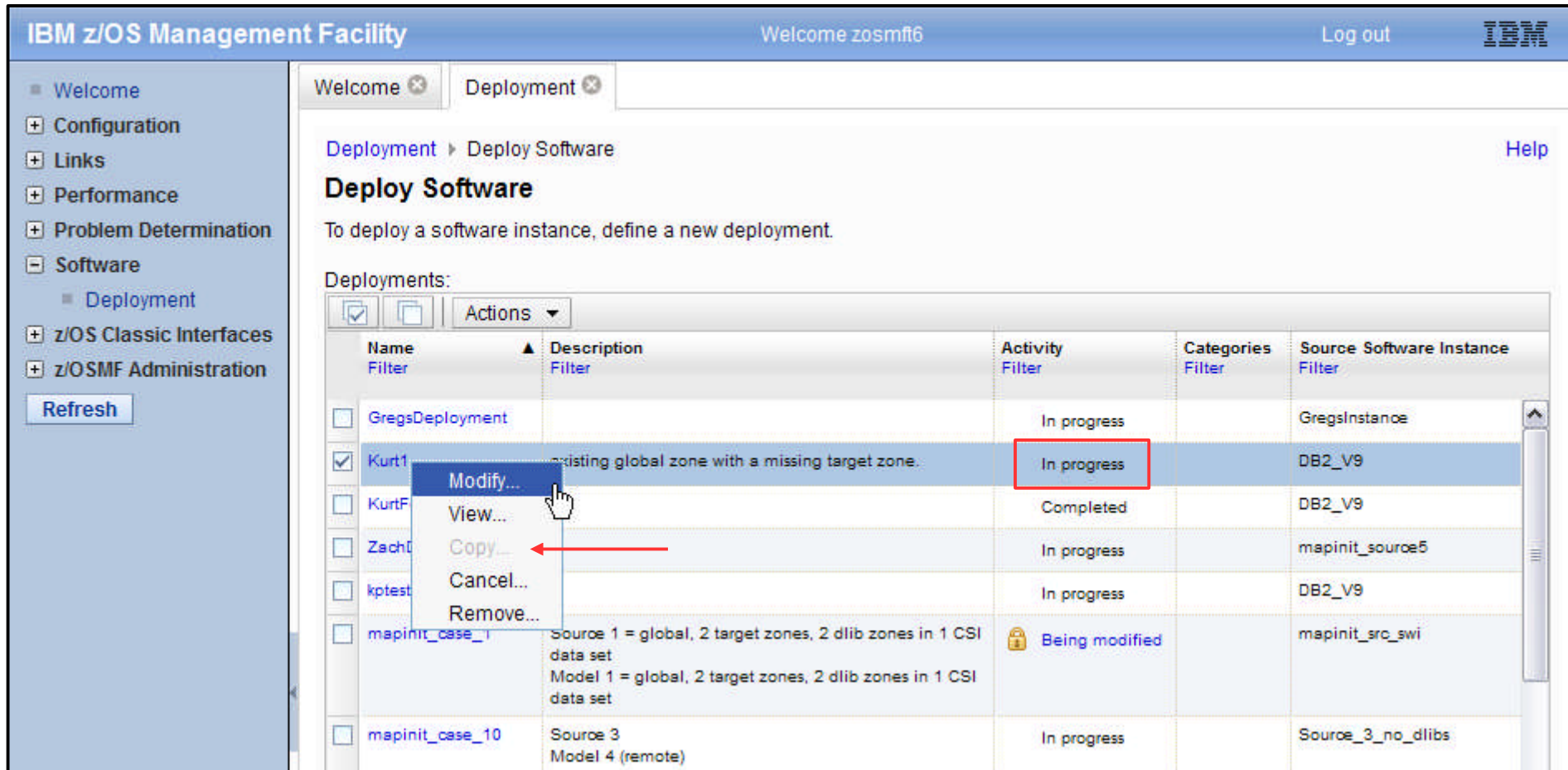


## Deployment Copy

- **Allows users to reuse a deployment.**
  - Reuse the configuration from a prior completed deployment.
- **Currently a deployment is a one-time operation.**
- **To perform the same deployment later, a user must create a new deployment from scratch**
  - The user must supply all the configuration information.
- **With this SPE, z/OSMF will allow a user to make a copy of a prior completed deployment and reuse the information that describes the target of that deployment.**
  - Data sets names, volumes, storage classes, catalog state, UNIX directory mount points, and zone names
  - z/OSMF will compare the saved information to the current source software instance and identify any discrepancies or differences
- **z/OSMF reuses the saved information as much as possible, thus making a second or subsequent deployment much quicker and easier.**
- **Examples:**
  - Distribute a single software instance to several different systems:
    - Create a deployment from scratch to the first system.
    - Copy the first deployment for the second and subsequent systems.
  - Deploy a software instance today. 6-months later update that instance with PTFs and deploy again:
    - Create a deployment from scratch for the first deployment.
    - 6-months later, copy the first deployment.

## Deployment Copy

- When displaying the list of deployments, only Completed deployments may be copied.



**IBM z/OS Management Facility** Welcome zosmf6 Log out IBM

Welcome Deployment

Deployment Deploy Software Help

**Deploy Software**

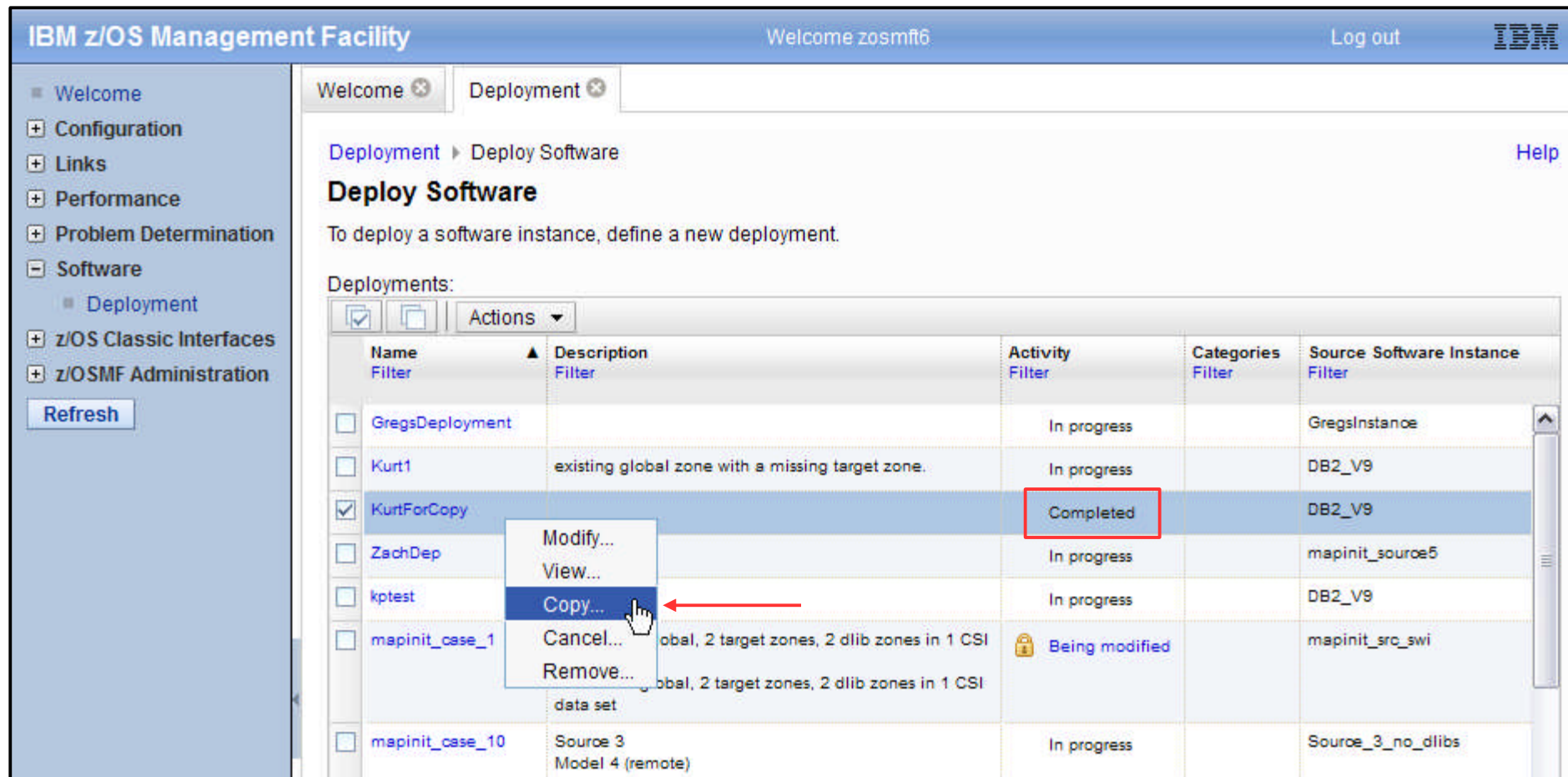
To deploy a software instance, define a new deployment.

Deployments:

Name Filter	Description Filter	Activity Filter	Categories Filter	Source Software Instance Filter
<input type="checkbox"/> GregsDeployment		In progress		GregsInstance
<input checked="" type="checkbox"/> Kurt1	existing global zone with a missing target zone.	In progress		DB2_V9
<input type="checkbox"/> KurtF		Completed		DB2_V9
<input type="checkbox"/> ZachD		In progress		mapinit_source5
<input type="checkbox"/> kptest		In progress		DB2_V9
<input type="checkbox"/> mapinit_case_1	Source 1 = global, 2 target zones, 2 dlib zones in 1 CSI data set Model 1 = global, 2 target zones, 2 dlib zones in 1 CSI data set	Being modified		mapinit_src_swi
<input type="checkbox"/> mapinit_case_10	Source 3 Model 4 (remote)	In progress		Source_3_no_dlibs

## Deployment Copy

- When displaying the list of deployments, only Completed deployments may be copied.



IBM z/OS Management Facility Welcome zosmf6 Log out

Deployment Deployment

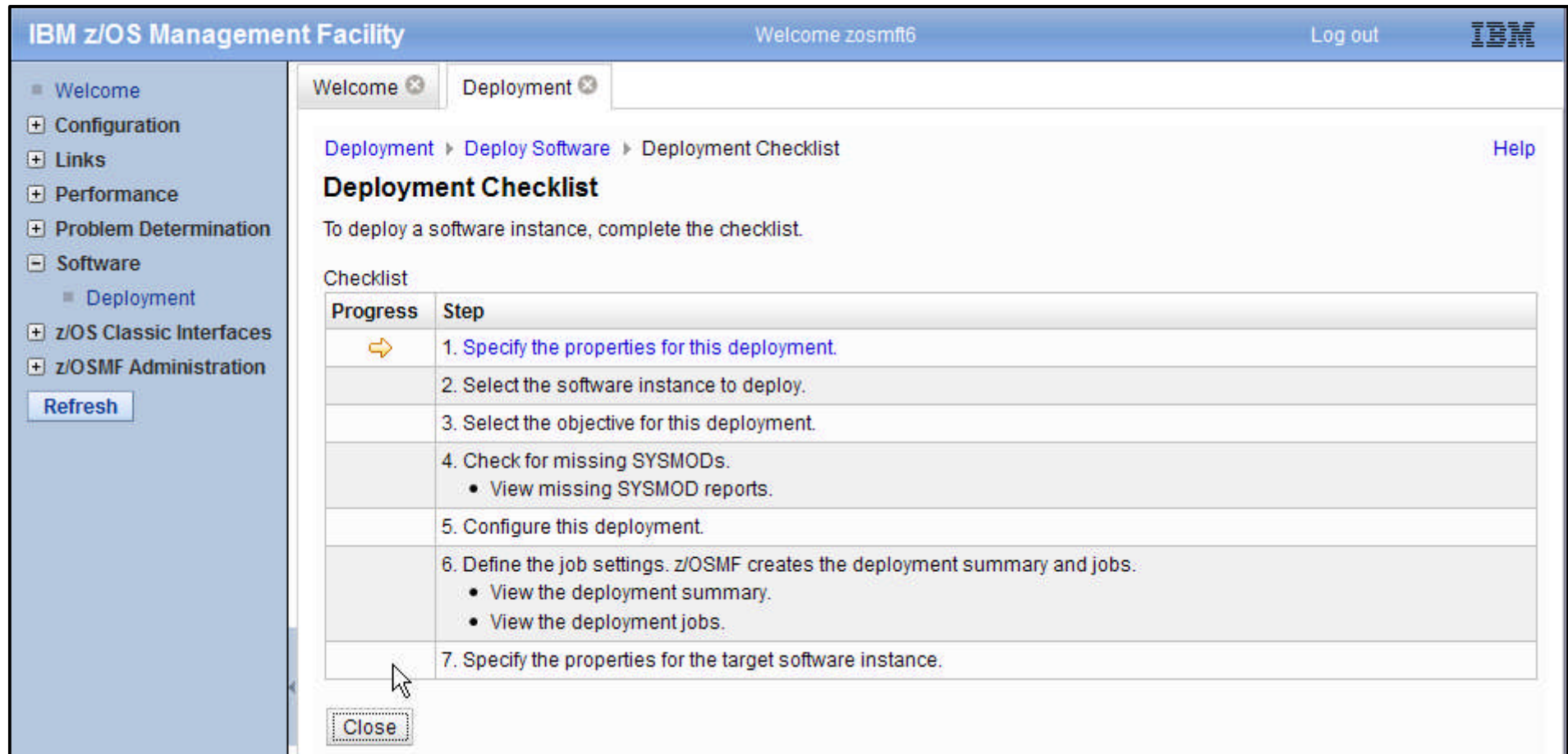
### Deploy Software

To deploy a software instance, define a new deployment.

Deployments:

Name	Description	Activity	Categories	Source Software Instance
<input type="checkbox"/> GregsDeployment		In progress		GregsInstance
<input type="checkbox"/> Kurt1	existing global zone with a missing target zone.	In progress		DB2_V9
<input checked="" type="checkbox"/> KurtForCopy		Completed		DB2_V9
<input type="checkbox"/> ZachDep		In progress		mapinit_source5
<input type="checkbox"/> kptest		In progress		DB2_V9
<input type="checkbox"/> mapinit_case_1	Global, 2 target zones, 2 dlib zones in 1 CSI	Being modified		mapinit_src_swi
<input type="checkbox"/> mapinit_case_10	Source 3 Model 4 (remote)	In progress		Source_3_no_dlibs

# Deployment Copy



IBM z/OS Management Facility Welcome zosmf6 Log out IBM

Welcome Deployment

Deployment > Deploy Software > Deployment Checklist Help

## Deployment Checklist

To deploy a software instance, complete the checklist.

Checklist

Progress	Step
➡	1. <a href="#">Specify the properties for this deployment.</a>
	2. Select the software instance to deploy.
	3. Select the objective for this deployment.
	4. Check for missing SYSMODs. <ul style="list-style-type: none"> <li>View missing SYSMOD reports.</li> </ul>
	5. Configure this deployment.
	6. Define the job settings. z/OSMF creates the deployment summary and jobs. <ul style="list-style-type: none"> <li>View the deployment summary.</li> <li>View the deployment jobs.</li> </ul>
	7. Specify the properties for the target software instance.

Close



## Deployment Copy



- **All of the information from the original deployment is copied into the new deployment, but can be changed if desired.**
- **Each step of the new deployment must be visited so the user can verify the default/copied selections.**
  1. A default deployment name is generated using a name suffix algorithm. Description and Categories are copied.
  2. Original source software instance is selected.
  3. Original objective and target system is selected.
  4. Original instances for reporting are selected. Fresh reports must be run.
  5. Original configuration is primed.
    - Zone names, data set names, volumes, storage classes, data set catalog state, volume properties, UNIX data set mount points.
  6. Job card for the user and system is used, not copied from the original deployment.
  7. A default target software instance name is generated using a name suffix algorithm. Description and Categories are copied.



## NEW FUNCTION – APAR PM40764 and PM50651



- **To further restrict access to the objects and actions, define a SAF resource profile for each object and grant users the appropriate access authority.**
  - Regardless of where the physical resource described by an object resides, the SAF profiles for that object must be defined on the z/OS system that hosts the z/OSMF instance to which a user's Web browser is connected.
    - The Deployment task uses this z/OS system when performing SAF authorization checking.
- **Use the SAF resource names, which are generated by the Deployment task, to help you define profiles that will control user access to an object or an action.**
- **The SAF resource names for each object are constructed using properties of the object.**
  - The casing used for each property value is preserved; therefore, SAF resource names are case sensitive.



## User Authorization

- **Allow use of SAF profiles to control which users may access individual objects.**
- **For example, don't let DB2 sysprogs touch z/OS objects and vice versa.**
  - Software instances
  - Deployments
  - Global zones
  - Categories
- **All objects are visible in the table displays, but actions may not be allowed for selected objects based on a user's authorization.**
  - No authorization checks are performed to populate lists of objects.
- **When a user selects an object and action, z/OSMF will perform an authorization check for the user and action for the selected object before continuing.**
  - Software Deployment plug-in uses a z/OSMF AuthorizationManager class
  - z/OSMF uses some WebSphere interface
  - WebSphere uses some SAF interface
- **Software Deployment will only perform authorization checks if z/OSMF is configured to use SAF mode authorization vs. Repository mode authorization.**
- **The default z/OSMF configuration allows all users full authorization access.**



## User Authorization...

- **z/OSMF SAF authorization uses resources in the ZMFAPLA class (new class in z/OS R13).**
- **z/OSMF SAF resource names are of the form:**

`<safPrefix>.ZOSMF.pluginName.taskName<.suffix>`

- `safPrefix` is defined during WAS OEM configuration, default and typical is BBNBASE
  - `pluginName` is the name of the plug-in, SOFTWARE\_DEPLOYMENT
  - `taskName` is the name for the task in the Navigator, DEPLOYMENT
  - `suffix` is additional qualifiers to uniquely identify actions and resources for the plug-in.
- **For Software Deployment each object has a unique SAF resource name associated with it of the form:**

`BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.objectType.objectSuffix`

- `DATA` separates the resource name space for objects from the name space for actions
- `objectType` indicates the type of object
  - SWI – software instance
  - DEP – deployment
  - GZN – global zone
  - CAT – category
- `objectSuffix` is unique for each type of object



## User Authorization: Example – z/OS and DB2 Sysprogs

**Give z/OS sysprogs CONTROL access to z/OS objects and DB2 sysprogs CONTROL access to DB2 objects. Allow everyone READ access.**

### 1. Allow only administrators to add and modify categories:

```
RDEFINE ZMFAPLA +  
  (BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DEPLOYMENT.CATEGORIES.MODIFY)  
UACC(NONE)  
PERMIT BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DEPLOYMENT.CATEGORIES.MODIFY +  
  CLASS(ZMFAPLA) ID(IZUADMIN) ACCESS(READ)
```

### 2. Force all objects to be assigned at least one category:

```
RDEFINE ZMFAPLA +  
  (BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.CAT.NOCATEGORY) UACC(NONE)
```

**Permit no users!**

### 3. As an administrator, define categories “z/OS” and “DB2”.





## User Authorization: Example – z/OS and DB2 Sysprogs...

### 4. Allow DB2 sysprogs CONTROL access to DB2 objects:

```
RDEFINE ZMFAPLA +  
  (BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.*.DB2.** ) UACC(NONE)  
PERMIT BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.*.DB2.** +  
  CLASS(ZMFAPLA) ID(DB2PROG) ACCESS(CONTROL)
```

### 5. Allow all other users READ access to DB2 objects:

```
PERMIT BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.*.DB2.** +  
  CLASS(ZMFAPLA) ID(IZUUSER) ACCESS(READ)
```

### 6. Allow z/OS sysprogs CONTROL access to z/OS objects:

```
RDEFINE ZMFAPLA +  
  (BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.*.z/OS.** ) UACC(NONE)  
PERMIT BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.*.z/OS.** +  
  CLASS(ZMFAPLA) ID(ZOSPROG) ACCESS(CONTROL)
```

### 7. Allow all other users READ access to z/OS objects:

```
PERMIT BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.*.z/OS.** +  
  CLASS(ZMFAPLA) ID(IZUUSER) ACCESS(READ)
```



## User Authorization: Object Name Syntax

- **Software Deployment object names will be used in SAF resource names.**
- **z/OSMF currently has little or no restrictions on the allowed character set in object names.**
- **However, SAF and TSO have some limitations:**
  - Some characters SAF does not support in resource or profile names (ie. blank)
  - Some characters are supported in profile names but are used as generic characters (ie. \*, &, %)
  - Some characters and combinations cannot be specified in TSO commands to create SAF profiles (ie. parenthesis)
- **Therefore, Software Deployment object names are now more restrictive.**
  - Ensures object names can be used in SAF resource and profile names.
  - Add and Modify actions will allow only supported characters (blank among others are no longer supported).



## User Authorization: Hints and Tips

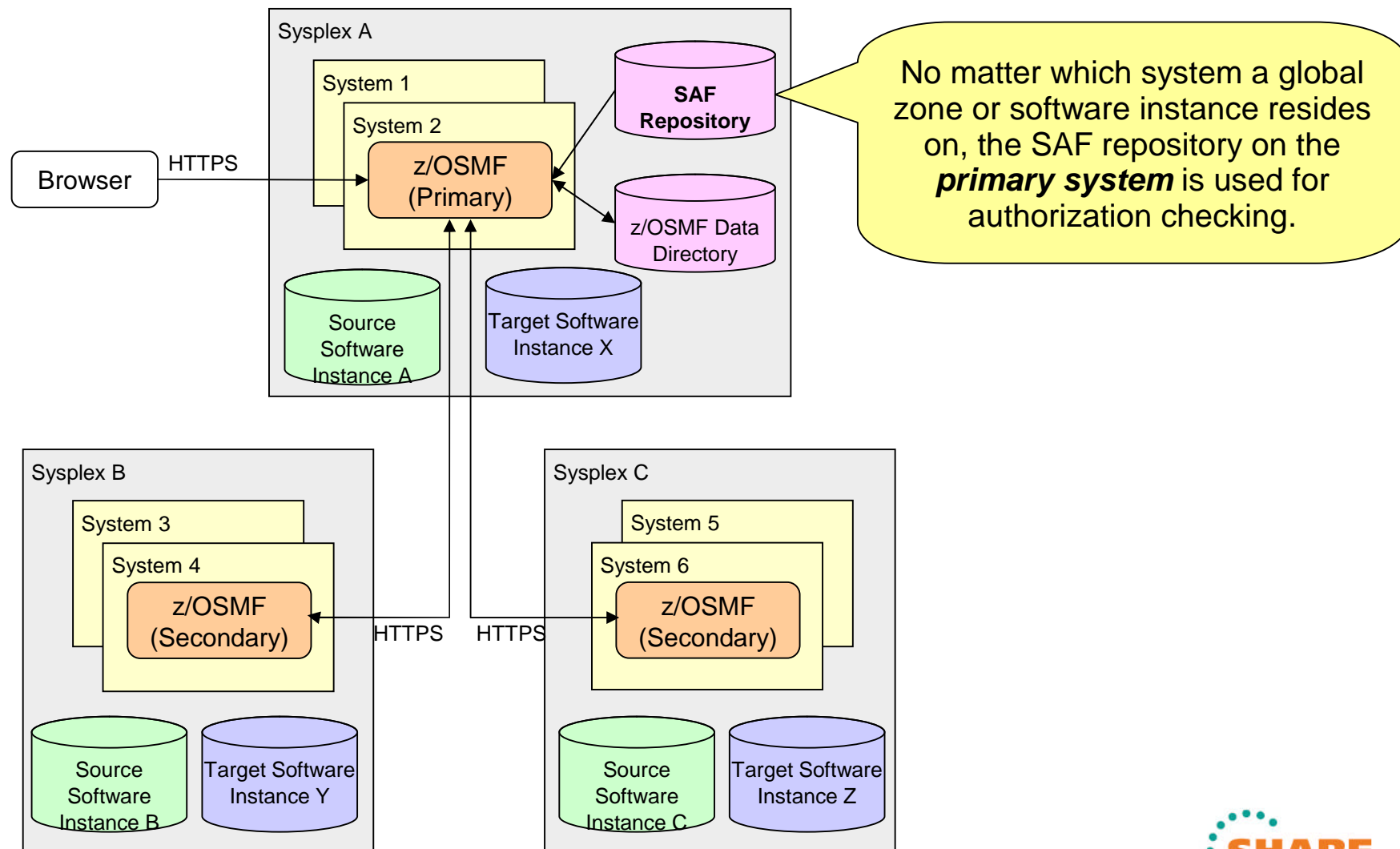
- **SAF resource names and profiles are case sensitive.**
  - Object names and profiles must have matching case in order for a particular profile to be used when checking authorization of an object.
- **Useful RACF commands:**
  - Search for all of the profiles that affect Software Deployment:  

```
SEARCH ALL CLASS(ZMFAPLA) +  
  FILTER(BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.**)
```
  - List a specific profile:  

```
RLIST ZMFAPLA BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT.DATA.**  
AUTHUSER
```
  - Or in one fell swoop:  

```
SEARCH ALL CLASS(ZMFAPLA) +  
  FILTER(BBNBASE.ZOSMF.SOFTWARE_DEPLOYMENT) +  
  CLIST(RLIST ZMFAPLA ' ' AUTHUSER') NOLIST  
EXEC EXEC.RACF
```
- **To debug authorization troubles a z/OSMF trace (finer) can be helpful.**
  - Resource names and userids for authorization checks are echoed in the trace.

## User Authorization: Hints and Tips...





## Software Management

### ■ **z/OSMF V1.13 introduced a Software Deployment function**

– Introduced a concept of a software instance

- Used to describe the SMP/E Global zone and target zone(s) that will be analyzed to identify the data sets to copy.
- Can also include non-SMP/E managed data sets

### ■ **IBM plans to introduce a Software Management task that will extend the Software Deployment task to provide additional actions on software instances.**

– This function is planned to be made available on z/OSMF V1.13 prior to the availability of z/OSMF V2.1



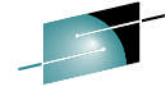


## In the Future on z/OSMF V1.13 ...

- **In addition to deploying a software instance, the Software Management task will:**
  - Allow inspection of a software instance to view the product, feature, and FMID content;
  - View the physical data sets that compose a software instance; and
  - Perform actions to analyze and report on software instances and installed products.
    - Identify software products that are approaching, or have reached, end of service support.
    - Validate the SMP/E structure and content of a software instance is correct.
    - Identify missing HIPER and PE fixes, and fixes associated with one or more fix categories
    - Determine if individual fixes are installed and in which software instances.
    - Compare the service and functional content of two software instances to aid in debugging or migration planning.

# z/OSMF Software Management (R13)

## Benefits



**SHARE**  
Technology • Connections • Results

Task	Without z/OSMF Software Management	With z/OSMF Software Management
Display the product content of software instances.	Can use multiple different methods to report on product content locally (within sysplex). <b>Unable to:</b> <ul style="list-style-type: none"> <li>▪ launch in context other views or reports</li> <li>▪ View product content for remote systems</li> </ul>	Easy (few clicks) to identify one or more software instances (locally or remote) that you want to view product information. Once viewed, the user can launch in context additional views, reports, or follow links to additional information. Seconds
Display the data sets that make up a software instances.	<b>Can NOT be done today.</b> At best, the user can write their own program to identify data sets in local software instances.	Easy (few clicks) to identify the data sets actually used in a software instance Seconds (or up to a few minutes)
Display all the software instances where a product is installed.	<b>Can NOT be done today</b>	Easy (few clicks) to identify all the software instances where a product is installed throughout the customer enterprise. Seconds
Identify software products that are approaching, or have reached, end of service support	Currently there are web sites that can be used to identify announced end of service dates, but they don't analyze installed software Hours (or even days for entire enterprise)	Easy (few clicks) to show end of service information for all installed products (or products in specific software instances). Results shown in both graphic and tabular form. Seconds
Validate the SMP/E structure (zones and data set definitions) and content (members on libraries and files) of software instances.	<b>Can NOT be done today</b>	Easy (few clicks) to identify any structure problems or missing content in a software instance and the data sets referenced A few minutes





# z/OSMF Software Management (R13)

## Benefits

Task	Without z/OSMF Software Management	With z/OSMF Software Management
Identify if any critical service (HIPER, PE fixing, or fixes associated with one or more fix categories) is missing	Can use multiple SMP/E REPORTs to identify missing critical fixes for local software instances. <b>However, this can only be done for local software instances (within sysplex).</b>  Less than a minute (for the local system)	Easy (few clicks) to identify missing critical fixes. Once viewed, z/OSMF sorting and filtering can help with the analysis.  Seconds (or up to a few minutes)
Identify whether a fix is installed or not; and if so in which software instances.	Can use either SMP/E query or LIST functions to see if a SYSMOD is installed. <b>However, this can only be done for local software instances (within sysplex).</b>  Less than a minute (for the local system)	Easy (few clicks) to identify whether a fix is installed or not; and if so in which software instances throughout your enterprise.  Less than a minute (for local and remote systems)
Compare the service and functional content of two software instances to aid in debugging, change control, or quality assurance	Can use SMP/E REPORT SYSMODS to identify differences between two target zones for local software instances. <b>However, this can only be done for local software instances (within sysplex).</b>  Less than a minute (for the local system)	Easy (few clicks) to identify differences between two target zones for software instances throughout your enterprise.  Seconds (or up to a few minutes)



# Summary

## ■ Recent Enhancements

- Support for unmounted z/OS UNIX file system data sets
- Support for deployment configuration copy
- Support for granular control over which users can view and modify deployment task artifacts

## ■ New Planned Enhancement

- Software Management

## ■ Backup Slides

- Software Deployment Hints and Tips



Thank  
You





## Additional Information

- **z/OS Management Facility website**
  - <http://ibm.com/systems/z/os/zos/zosmf/>
- **IBM z/OS Management Facility education modules in IBM Education Assistant**
  - <http://publib.boulder.ibm.com/infocenter/ieduasst/stgv1r0/index.jsp>
    - Scroll down to z/OS Management Facility
- **z/OS Hot Topics, Issue 21 and 23:**
  - [http://ibm.com/systems/z/os/zos/bkserv/hot\\_topics.html](http://ibm.com/systems/z/os/zos/bkserv/hot_topics.html)
- **IBM z/OS Management Facility Configuration Guide (SA38-0652)**
  - Renamed from IBM z/OS Management Facility User's Guide in z/OSMF V1.12
- **IBM WebSphere Application Server OEM Edition for z/OS Configuration Guide, Version 7.0 (GA32-0631)**
- **Program Directory for z/OS Management Facility (GI11-2886)**
- **IBM z/OS Management Facility License Information (GC52-1263)**



# System z Social Media

- System z official Twitter handle:
  - [@ibm\\_system\\_z](#)
- Top Facebook pages related to System z:
  - [Systemz Mainframe](#)
  - [IBM System z on Campus](#)
  - [IBM Mainframe Professionals](#)
  - [Millennial Mainframer](#)
- Top LinkedIn Groups related to System z:
  - [Mainframe Experts Network](#)
  - [Mainframe](#)
  - [IBM Mainframe](#)
  - [System z Advocates](#)
  - [Cloud Mainframe Computing](#)
- YouTube
  - [IBM System z](#)



- Lead m z:
  - [Evangelizing Mainframe \(Destination z blog\)](#)
  - [Mainframe Performance Topics](#)
  - [Common Sense](#)
  - [Enterprise Class Innovation: System z perspectives](#)
  - [Mainframe](#)
  - [MainframeZone](#)
  - [Smarter Computing Blog](#)
  - [Millennial Mainframer](#)



# Backup Slides Software Deployment Hints and Tips



## Software Deployment Hints and Tips

### ■ Cancelling and Removing Deployments

- Only canceled or completed deployments can be removed
- You can't remove (delete) deployments that are in progress
- If you want to remove a deployment that is in progress, you will have to cancel it first

Welcome mfusr01

Log out

IBM

Welcome Deployment

Deployment Deploy Software

Deploy Software

To deploy a software instance, define a new deployment.

Deployments:

Actions

Modify...

View...

Cancel...

Remove...

New...

Select All

Deselect All

Configure Columns...

Hide Filter Row

Clear Filters

Modify Sort...

Clear Sorts

Name	Activity	Categories	Source Software Instance	Source System	Target Software Instance	Target Sy
Filter	Filter	Filter	Filter	Filter	Filter	Filter
<input type="checkbox"/> MFUSR01 1	Completed		MFUSR01 SMP/E V3.6 with PTFs	LOCAL	MFUSR01 SW Deployment Lab Tgt	LOCAL
<input checked="" type="checkbox"/> User Exper and Tips	In progress		MFUSR01 SMP/E V3.6 with PTFs	LOCAL		LOCAL

Total: 2, Selected: 1

Refresh Last refresh: Jan 18, 2012 12:58:13 PM local time (Jan 18, 2012 5:58:13 PM GMT)

Close

To attempt to remove an in progress deployment:

1. Select the deployment to be removed

2. Click on Actions, and then Remove

Welcome mfusr01

Log out

IBM

Welcome ✕Deployment ✕

Deployment ▸ Deploy Software

Help

Deploy Software

To deploy a software instance, define a new deployment.


Deployments:

☒☐

Actions ▾

Name <a href="#">Filter</a>	Description <a href="#">Filter</a>	Activity <a href="#">Filter</a>	Categories <a href="#">Filter</a>	Source Software Instance <a href="#">Filter</a>	Source System <a href="#">Filter</a>	Target Software Instance <a href="#">Filter</a>	Target Sy: <a href="#">Filter</a>
<input type="checkbox"/> MFUSR01 Deploy Lab 1	z/OSMF Software Deployment Lab Exercise 1 - deploy SMP/E V3.6 with PTFs (without DLIBs)					MFUSR01 SW Deployment Lab Tgt	LOCAL
<input checked="" type="checkbox"/> User Experience Hints and Tips	Software Deployment to demonstrate some hints and tips						LOCAL

Warning

**IZUD203W**  
You are about to remove the selected deployments. Do you want to continue?

Selected deployments:

User Experience Hints and Tips

OK

Cancel

Total: 2, Selected: 1

Refresh

Last refresh: Jan 18, 2012 12:58:13 PM local time (Jan 18, 2012 5:58:13 PM)

Close

Pop-up window to ask you if you know what you are doing and do you want to continue



See message that the deployment could not be removed because it was in progress  
Click on the Message ID to see full text

Welcome

Deployment

Deployment Deploy Software

Deploy Software

Messages 1 0 0

Close All

IZUD773E: Deployment "User Experience Hints and Tips" cannot be removed because it is in progress.

Jan 18, 2012 12:59:25 PM

To deploy a software instance, define a new deployment.

Deployments:

☒ ☐

Actions

Name	Description	Activity	Categories	Source Software Instance	Source System	Target Software Instance	Target Sys
Filter	Filter	Filter	Filter	Filter	Filter	Filter	Filter
<input type="checkbox"/> MFUSR01 Deploy Lab 1	z/OSMF Software Deployment Lab Exercise 1 - deploy SMP/E V3.6 with PTFs (without DLIBs)	Completed		MFUSR01 SMP/E V3.6 with PTFs	LOCAL	MFUSR01 SW Deployment Lab Tgt	LOCAL
<input checked="" type="checkbox"/> User Experience Hints and Tips	Software Deployment to demonstrate some hints and tips	In progress		MFUSR01 SMP/E V3.6 with PTFs	LOCAL		LOCAL

Total: 2, Selected: 1

Refresh Last refresh: Jan 18, 2012 12:58:13 PM local time (Jan 18, 2012 5:58:13 PM GMT)

Close

Search:  **GO** [Search scope:](#) All topics

## Contents

- IZUD733E
- IZUD740E
- IZUD741E
- IZUD743E
- IZUD750E
- IZUD751E
- IZUD752E
- IZUD753E
- IZUD770E
- IZUD771E
- IZUD772E
- IZUD773E**
- IZUD774E
- IZUD775E
- IZUD776E
- IZUD777E
- IZUD778E
- IZUD779E
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- IZUD781E
- IZUD782E
- IZUD801I
- IZUD802I
- IZUD803I
- IZUD804I

[z/OSMF messages](#) > [IZUD0001-IZUD9999](#)

# IZUD773E

**Deployment *deployment-name* cannot be removed because it is in progress.**

## Explanation

The specified deployment cannot be removed because it is in progress. You can remove only canceled or completed deployments.

In the message text:

***deployment-name***

Name of the deployment.

## System programmer response

No action is required.

## User response

You can wait until the deployment is completed or cancel it, and then remove the deployment.

**Parent topic:** [IZUD0001-IZUD9999](#)

Welcome

Deployment

Welcome mfusr01Log outIBM

WelcomeDeployment

DeploymentDeploy SoftwareHelp

Deploy Software

Messages100Close All

IZUD773E: Deployment "User Experience Hints and Tips" cannot be removed because it is in progress.Jan 18, 2012 12:59:25 PM

To deploy a software instance, define a new deployment.

Deployments:

Actions

Modify...

View...

Cancel...

Remove...

New...

Select All

Deselect All

Configure Columns...

Hide Filter Row

Clear Filters

Modify Sort...

Clear Sorts

Name	Activity	Categories	Source Software Instance	Source System	Target Software Instance	Target Sys
Filter	Filter	Filter	Filter	Filter	Filter	Filter
<input type="checkbox"/> MFUSR011	Completed		MFUSR01 SMP/E V3.6 with PTFs	LOCAL	MFUSR01 SW Deployment Lab Tgt	LOCAL
<input checked="" type="checkbox"/> User Exper and Tips	In progress		MFUSR01 SMP/E V3.6 with PTFs	LOCAL		LOCAL

Total: 2, Selected: 1

RefreshLast refresh: Jan 18, 2012 12:58:13 PM local time (Jan 18, 2012 5:58:13 PM GMT)

Close

To cancel an in progress deployment:

1. Select the deployment to be canceled

2. Click on Actions, and then Cancel

Welcome mfusr01

Log out

IBM

Welcome Deployment

Deployment Deploy Software

Deploy Software

Messages 1 0 0 Close All

IZUD773E: Deployment "User Experience Hints and Tips" cannot be removed because it is in progress. Jan 18, 2012 12:59:25 PM

To deploy a software instance, define a new deployment

Deployments:

Filter

Filter

Name	Description
MFUSR01 Deploy Lab 1	z/OSMF Software Deployment Lab Exercise 1 - deploy SMP/E V3.6 with PTFs (without DLIBs)
User Experience Hints and Tips	Software Deployment to demonstrate some hints and tips

Target Software Instance	Target System
MFUSR01 SW Deployment Lab Tgt	LOCAL
	LOCAL

Confirm Cancel

IZUD207W

You are about to cancel the selected deployments. Doing so releases the lock for the associated software instances. Consequently, you can only view or remove the deployments. You cannot undo this action. Do you want to continue?

Selected deployments:

User Experience Hints and Tips

OK Cancel

Total: 2, Selected: 1

Refresh Last refresh: Jan 18, 2012 12:58:13 PM local time (Jan 18, 2012)

Close

Another pop-up window to ask you if you know what you are doing and do you want to continue

Clicking OK will cancel the deployment



Welcome mfusr01

Log out

IBM

Welcome Deployment

Deployment Deploy Software

Deploy Software

See message that the deployment was canceled

▼Messages 1 0 1

Close All

IZUD773E: Deployment "User Experience Hints and Tips" cannot be removed because it is in progress. Jan 18, 2012 12:59:25 PM

IZUD182I: Deployment "User Experience Hints and Tips" was canceled. Jan 18, 2012 1:01:31 PM

To deploy a software instance, define a new deployment.

Deployments:

Actions

Name	Description	Activity	Categories	Source Software Instance	Source System	Target Software Instance	Target Sys
Filter	Filter	Filter	Filter	Filter	Filter	Filter	Filter
<input type="checkbox"/> MFUSR01 Deploy Lab 1	z/OSMF Software Deployment Lab Exercise 1 - deploy SMP/E V3.6 with PTFs (without DLIBs)	Completed		MFUSR01 SMP/E V3.6 with PTFs	LOCAL	MFUSR01 SW Deployment Lab Tgt	LOCAL
<input checked="" type="checkbox"/> User Experience Hints and Tips	Software Deployment to demonstrate some hints and tips	Canceled		MFUSR01 SMP/E V3.6 with PTFs	LOCAL		LOCAL

Deployment canceled

Total: 2, Selected: 1

Refresh Last refresh: Jan 18, 2012 1:01:32 PM local time (Jan 18, 2012 6:01:32 PM GMT)

Close

Close



Welcome mfusr01

Log out

IBM

Welcome ✕Deployment ✕

Deployment ▶ Deploy Software

Help

Deploy Software

To deploy a software instance, define a new deployment.


Deployments:

☒☐

Actions ▼

Name <a href="#">Filter</a>	Description <a href="#">Filter</a>	Activity <a href="#">Filter</a>	Categories <a href="#">Filter</a>	Source Software Instance <a href="#">Filter</a>	Source System <a href="#">Filter</a>	Target Software Instance <a href="#">Filter</a>	Target Sy: <a href="#">Filter</a>
<input type="checkbox"/> MFUSR01 Deploy Lab 1	z/OSMF Software Deployment Lab Exercise 1 - deploy SMP/E V3.6 with PTFs (without DLIBs)					MFUSR01 SW Deployment Lab Tgt	LOCAL
<input checked="" type="checkbox"/> User Experience Hints and Tips	Software Deployment to demonstrate some hints and tips						LOCAL

Warning

 **IZUD203W**

You are about to remove the selected deployments. Do you want to continue?

Selected deployments:

User Experience Hints and Tips

OK

Cancel

Total: 2, Selected: 1

Refresh

Last refresh: Jan 18, 2012 12:58:13 PM local time (Jan 18, 2012 5:58:13 PM GMT)

Close

Click OK to remove the deployment

Welcome mfusr01

Log out

IBM

Welcome Deployment

Deployment Deploy Software

Deploy Software

See message that the deployment was removed

▼Messages 1 0 2

Close All

IZUD773E: Deployment "User Experience Hints and Tips" cannot be removed because it is in progress.

IZUD182I: Deployment "User Experience Hints and Tips" was canceled.

IZUD172I: Deployment "User Experience Hints and Tips" was removed.

To deploy a software instance, define a new deployment.

Deployments:

Actions

Name Filter	Description Filter	Activity Filter	Categories Filter	Source Software Instance Filter	Source System Filter	Target Software Instance Filter	Target System Filter
<input type="checkbox"/> MFUSR01 Deploy Lab 1	z/OSMF Software Deployment Lab Exercise 1 - deploy SMP/E V3.6 with PTFs (without DLIBs)	Completed		MFUSR01 SMP/E V3.6 with PTFs	LOCAL	MFUSR01 SW Deployment Lab Tgt	LOCAL

Total: 1, Selected: 0

Refresh Last refresh: Jan 18, 2012 1:01:56 PM local time (Jan 18, 2012 6:01:56 PM GMT)

Close



## Software Deployment Hints and Tips

### ■ Submitting Deployment jobs

- Do **NOT** edit the generated jobs
  - You should make your changes using the dialog to configure your deployment
  - Editing the copy job will cause it to fail



## Navigation Hints and Tips

- **Never use the Browser Back button**
  - Use the “bread crumbs” instead
- **In general, the Enter key doesn’t advance the dialog**
  - You need to click on links or action buttons to advance
- **Never use blanks in software instance, deployment, or category names**
  - You can use national characters, or underscores (“\_”)
  - Software instance, deployment, and an category names (if used) will be resource names for security
    - The security profile resource names can’t contain blanks

IBM z/OS Management Facility - Mozilla Firefox: IBM Edition

File Edit View History Bookmarks Tools Help

Do **NOT** use the browser Back button

Most Visited IBM Business Transfor... IBM Standard Softwar... IT Help Central Join World Community... IBM IBM IBM IBM

IBM Workplace - Home Winter 2012 Atlanta: Speaker In... IBM z/OS Management Facility

## IBM z/OS Management

You **CAN** use the “bread crumbs” to jump backward

- Welcome
- + Configuration
- + Links
- + Performance
- + Problem Determination
- Software
  - Deployment
- + z/OS Classic Interfaces

Refresh

Welcome Deployment

Deployment > Deploy Software > Deployment Checklist

### Deployment Checklist

To deploy a software instance, complete the checklist.

Checklist

Progress	Step
✓	1. Specify the properties for this deployment.
✓	2. Select the software instance to deploy.
✓	3. Select the objective for this deployment.
✓	4. Check for missing SYSMODs. <ul style="list-style-type: none"><li>View missing SYSMOD reports.</li></ul>
⇒	5. Configure this deployment.
	6. Define the job settings. z/OSMF creates the deployment summary and jobs. <ul style="list-style-type: none"><li>View the deployment summary.</li><li>View the deployment jobs.</li></ul>
	7. Specify the properties for the target software instance.



Close



## Navigation Hints and Tips ...

- **In multi-tab summary displays, don't click OK until you've viewed all tabs**
  - If you do you may want to close the current window and select the link for the summary display to see any remaining tabs.
- **In table displays where you want to perform multiple actions, don't click OK (or Next) until all your updates have been made**
  - If you do you may get error or warning messages if additional changes are required



Welcome Deployment [Deployment](#) ▶ [Deploy Software](#) ▶ [Deployment Checklist](#) ▶ [View Deployment Summary](#)[Help](#)

## View Deployment Summary

Review the changes that will occur on the target system when you submit the deployment jobs.

Source software instance: MFUSR01 SMP/E V3.6 with PTFs on system LOCAL

Target system: LOCAL

Deployment objective: Create new software instance, connect to existing global zone

SMP/E Zones

Volumes

Data Sets to Delete

Data Sets to Add

Data Sets to Replace

Catalogs

Catalog Aliases

Catalog Entries To Delete

Catalog Entries To Add



Catalog Entries To Update

Volumes

Volume	Initialize Volume	Data Sets to Delete	Data Sets to Add	Data Sets to Replace
SHRESB			Yes	
SHRESA			Yes	

**Don't click OK until you've opened all the tabs above**

OK

Welcome Deployment [Deployment](#) ▶ [Deploy Software](#) ▶ [Deployment Checklist](#) ▶ Configure Deployment

He

**Configure Deployment for MFUSR01 SMP/E V3.6 with PTFs**




- ✓ Welcome
- ✓ DLIBs
- ✓ Model
- ✓ SMP/E Zones
- **Data Sets**

Catalogs  
Volumes and Storage  
Classes  
Mount Points

**Data Sets**

The Data Sets table lists the names, volumes, and storage classes that will be used for the data sets included in the target software instance. Accept the default names, volumes, and storage classes, or use the **Modify** action to modify them.

**Data Sets**

  Actions 							
Target Data Set Name <small>Filter</small>	Target Volume <small>Filter</small>	Target Storage Class <small>Filter</small>	Messages <small>Filter</small>	Source Data Set Name <small>Filter</small>	Source Volumes <small>Filter</small>	Source Storage Class <small>Filter</small>	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.MACLIB	SHRESA			ZOSMF.SMPE36P.GIM.MACLIB	SHR002	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.MIGLIB	SHRESA			ZOSMF.SMPE36P.GIM.MIGLIB	SHR004	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.NONSMP.DATA	SHRESA			ZOSMF.SMPE36P.GIM.NONSMP.DATA	SHR003	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.SAMPLIB	SHRESA			ZOSMF.SMPE36P.GIM.SAMPLIB	SHR005	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.SGIMCLS0	SHRESA			ZOSMF.SMPE36P.GIM.SGIMCLS0	SHR003	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.SGIMLMD0	SHRESA			ZOSMF.SMPE36P.GIM.SGIMLMD0	SHR001	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.SGIMMENU	SHRESA			ZOSMF.SMPE36P.GIM.SGIMMENU	SHR002	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.SGIMPENU	SHRESA			ZOSMF.SMPE36P.GIM.SGIMPENU	SHR002	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.SGIMSENU	SHRESA			ZOSMF.SMPE36P.GIM.SGIMSENU	SHR002	SHARE	
<input checked="" type="checkbox"/> ZOSMF2.SMPE36N.GIM.SGIMTENU	SHRESA			ZOSMF.SMPE36P.GIM.SGIMTENU	SHR001	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.SMPE36P.ZFS		SHARE		ZOSMF.SWDEPLOY.SMPE36P.ZFS	SHR005	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.TARGET.SMPE36P.CSI		SHARE		ZOSMF.SWDEPLOY.TARGET.SMPE36P.CSI	SHR005	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPL		SHARE		ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPL	SHR003	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPL		SHARE		ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPL	SHR001	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPL		SHARE		ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPL	SHR005	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPM		SHARE		ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPM	SHR003	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPS		SHARE		ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPS	SHR001	SHARE	
<input type="checkbox"/> ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPS		SHARE		ZOSMF.SWDEPLOY.TARGET.SMPE36P.SMPS	SHR004	SHARE	

Total: 18, Selected: 10

&lt; Back

Next &gt;

Finish

Cancel

**Don't click Next until you've completed all your changes**



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