IBM

Program Directory for

Remote Spooling Communications Subsystem

(RSCS) Networking for z/VM

function level 720

Program Number 5741-A09

for Use with
z/VM version 7 release 2

Document Date: September 2020

GI13-4363-01

Note!

Before using this information and the product it supports, be sure to read the general information under "Notices" on page 74.

This program directory, dated September 2020, applies to IBM® RSCS Networking for z/VM, function level 720, Program Number 5741-A09.

Contents

Figures

RSCS Web Information

The RSCS web page can be visited at URL: **http://www.vm.ibm.com/related/rscs**

There you will find:

- Additional useful information, hints, and tips.

- A PDF version of the RSCS program directory available for viewing.

- The ability to subscribe to future information updates.

1.0 Introduction

This program directory is intended for the system programmer responsible for program installation and maintenance. It contains information concerning the material and procedures associated with the installation of RSCS Networking for z/VM and RSCS Data Interchange Manager. The *z/VM: RSCS Networking Planning and Configuration* book is used as reference material for RSCS and all RSCS server machines. You should read all of this program directory before installing the program and then keep it for future reference.

When you are ready to install RSCS Networking for z/VM, read 3.1, "Preventive Service Planning" on page 6. This section tells you how to find any updates to the information and procedures in this program directory.

```
┌─ Note! ──────────────────────────────────────────────────────────────────────┐
│                                                                               │
│  Knowledge of VMSES/E is required prior to installing and/or servicing RSCS.  For a complete  │
│  description of VMSES/E refer to z/VM: VMSES/E Introduction and Reference.     │
│                                                                               │
└───────────────────────────────────────────────────────────────────────────────┘
```

The program directory contains the following sections:

- 2.0, "Program Materials" on page 3 identifies the basic and optional program materials and documentation for RSCS.

- 3.0, "Program Support" on page 6 describes the IBM support available for RSCS.

- 4.0, "Program and Service Level Information" on page 7 lists the APARs (program level) and PTFs (service level) incorporated into RSCS.

- 5.0, "Installation Requirements and Considerations" on page 8 identifies the resources and considerations for installing and using RSCS.

- 6.0, "Installation Instructions" on page 16 provides detailed installation instructions for RSCS.

- 7.0, "Service Instructions" on page 27 provides servicing instructions for RSCS.

- Appendix A, "Test the Installation/Service for RSCS" on page 28 provides instructions on testing for RSCS.

- Appendix B, "Supplied Sample Packages" on page 48 provides a list of sample packages provided with RSCS.

- Appendix C, "Moving RSCS to SFS Directories and Creating a PPF Override" on page 66 provides detailed information on moving RSCS into the shared file system (SFS) and overriding the default Product Parameter File (PPF).

- Appendix D, "Disabling RSCS" on page 73 provides a description of disabling RSCS if on z/VM, when RSCS is not licensed.

1.1 Important RSCS Install Information

RSCS is pre-installed on the z/VM® System deliverable in a disabled state. Most of the installation steps have already been completed. You will still need to complete some planning steps and the steps to place RSCS into production. In addition, you should be aware of information provided in 6.3, "Local Modifications to RSCS (Optional)" on page 18.

RSCS is preinstalled disabled, however, support for most RSCS TCP/IP printing and sender-initiated file transfer functions are available. All other RSCS functions are disabled, and attempts to use them will result in the issuance of either message DMT257I or DMT258I. Message DMT257I will also be issued if RSCS detects it is running disabled during initialization.

2.0 Program Materials

An IBM program is identified by a program number and a feature code. The program number for RSCS is 5741-A09.

The program announcement material describes the features supported by RSCS. Ask your IBM marketing representative for this information if you have not already received a copy.

The following sections identify:

- The basic and optional program materials available with this program
- Program publications.

2.1 Basic Machine-Readable Material

RSCS is a priced feature of z/VM version 7 release 2 and is distributed pre-installed in a disabled state as part of the z/VM System deliverable. Therefore, there are no basic machine readable materials. You must order RSCS to enable and use the full product. Refer to the z/VM version 7 release 2 Software Announcement for information on ordering z/VM version 7 release 2 and its features.

2.2 Optional Machine-Readable Material

There are no optional machine-readable materials for RSCS.

2.3 Program Publications

The following sections identify the basic and optional publications for RSCS.

2.3.1 Basic Program Publications

Figure 1 identifies the informal shipped documentation for RSCS. One copy of this publication is included with your RSCS order.

Figure 1. Basic Material: Informal Documentation

Publication Title	Form Number
Memo to Users IBM Remote Spooling Communications Subsystem (RSCS) Networking for z/VM, function level 720	GI13-4370

The following publication is part of your order for RSCS but it is only available as softcopy. Refer to the 2.3.4, "Softcopy Publications" on page 4 for the World Wide Web URLs that the program directory can be found at.

Figure 2. Basic Material: Unlicensed Publications

Publication Title	Form Number
Program Directory for Remote Spooling Communications Subsystem (RSCS) Networking for z/VM	GI13-4363-01

2.3.2 Base Program Publications

Figure 3 identifies the base program publications for RSCS.

Figure 3. Basic Material

Publication Title	Form Number
z/VM: RSCS Networking Planning and Configuration	SC24-6320
z/VM: RSCS Networking Operation and Use	SC24-6319
z/VM: RSCS Networking Exit Customization	SC24-6317
z/VM: RSCS Networking Messages and Codes	GC24-6318

Note: This program directory is part of your order for RSCS but it is only available softcopy. Refer to 2.3.4, "Softcopy Publications" for the World Wide Web URLs where it can be found.

2.3.3 Optional Program Publications

Figure 4 identifies the optional publications for RSCS.

Figure 4. Optional Material

Publication Title	Form Number
z/VM: RSCS Networking Diagnosis	GC24-6316

2.3.4 Softcopy Publications

RSCS publications, with the exception of the Program Directory, are available in the z/VM library in the IBM Knowledge Center web site:

   http://www.ibm.com/support/knowledgecenter/SSB27U

In addition, the RSCS publications, including this program directory, are available as PDF documents from the z/VM internet library home page on the World Wide Web; the URL for this home page is:

   www.vm.ibm.com/library

2.4 Program Source Materials

No program source materials or viewable program listings are provided with RSCS.

2.5 Publications Useful During Installation/Service

The publications listed in Figure 5 on page 5 may be useful during the installation of RSCS.

Figure 5. Publications Useful During Installation / Service on z/VM V7.2

Publication Title	Form Number
z/VM: VMSES/E Introduction and Reference	GC24-6336
z/VM: Service Guide	GC24-6325
z/VM: Installation Guide	GC24-6292
z/VM: CMS Commands and Utilities Reference	SC24-6260
z/VM: CMS File Pool Planning, Administration, and Operation	SC24-6261
z/VM: CP Planning and Administration	SC24-6271
z/VM: Saved Segments Planning and Administration	SC24-6322
z/VM: Group Control System	SC24-6289
z/VM: Other Components Messages and Codes	GC24-6300
z/VM: CMS and REXX/VM Messages and Codes	GC24-6255
z/VM: CP Messages and Codes	GC24-6270

3.0 Program Support

This section describes the IBM support available for RSCS.

3.1 Preventive Service Planning

Before installing RSCS, check with your IBM Support Center or use IBMLink™ (Service Link) to see if there is additional Preventive Service Planning (PSP) information available. To obtain this information, specify the following UPGRADE and SUBSET values:

Figure 6. PSP Upgrade and Subset ID

COMPID	Retain Release	Upgrade	Subset	Description
568409601	720	RSCS720	RSCS/720	Install information
568409601	720	RSCS720	yynnRSU	RSU service recommendations

Note: RSU-BY-LVL information can be obtained from the z/VM service RSU web site at url:

www.vm.ibm.com/service/rsu

3.2 Statement of Support Procedures

With RSCS Networking for z/VM you are entitled to support under the basic warranty for z/VM V7.2. Also, note that the Software Subscription and Support for RSCS is *automatically* added to your order - this provides IBM Z® service to which you are likely accustomed. If you do not want the Software Subscription and Support for RSCS, then you must take specific action to decline it when ordering RSCS.

Report any difficulties you have using this program to your IBM Support Center. If an APAR is required, the Support Center will provide the address to which any needed documentation can be sent.

Figure 7 identifies the component IDs (COMPID), Retain Release and Field Engineering Service Numbers (FESN) for RSCS.

Figure 7. Component IDs

COMPID	Retain Release	Component Name	FESN
568409601	720	RSCS	0465049

4.0 Program and Service Level Information

This section identifies the program and any relevant service levels of RSCS. The program level refers to the APAR fixes incorporated into the program. The service level refers to the PTFs integrated. Information about the cumulative service RSU is also provided.

4.1 Program Level Information

The following APAR fixes against RSCS have been incorporated into this release:

VM65169 VM65602 VM65620 VM65788 VM65908 VM65924 VM66078 VM66124 VM66174

4.2 Service Level Information

This is the initial release of RSCS. There are no PTFs on the installation media.

4.3 Cumulative Service Deliverable

Cumulative service for RSCS is available through periodic preventive service, the Recommended Service Upgrade (RSU). The RSU is used to provide service updates for multiple z/VM components and features (including RSCS) and is often referred to as a *stacked* RSU.

The stacked RSU can be obtained by ordering PTF UM97720.

Check the PSP bucket upgrade RSCS720 and subset yynnRSU (where yynn is the RSU service level) for the latest RSU available. For a list of the PTFs included on the RSU, see the service memo from the tape or refer to the RSU-BY-LVL information obtained from the VM service RSU web site at url:

   www.vm.ibm.com/service/rsu

5.0 Installation Requirements and Considerations

The following sections identify the system requirements for installing and activating RSCS.

5.1 Hardware Requirements

There are no special requirements for RSCS.

5.2 Program Considerations

The following sections list the programming considerations for installing RSCS and activating its functions.

5.2.1 Operating System Requirements

The following operating systems can be used to install RSCS:

- z/VM version 7 release 2

5.2.2 Required Program Products / Components

The GCS component of z/VM is required to run RSCS.

The following is required to run RSCS if SNA links are desired or if reassembly of modules DMTLOG, DMTVXT, DMTSCT, DMTSNE, DMTSPT, or DMTSJE is desired:

- The High Level Assembler V1R6 is required if reassembling any of the above RSCS modules with VTAM® MACLIBs. They will not assemble cleanly using older assemblers.

The following is required to run the GETHOSTC MODULE (which provides Domain Name Server support for RSCS):

- The C runtime library supplied with z/VM.

The following is required to run RSCS Data Interchange Manager, the GETHOSTC MODULE, or any of the TCP/IP drivers provided with RSCS:

- IBM VM TCP/IP supplied with z/VM.

IBM Library for REXX on zSeries (5695-014) version 1 release 4 is required if using compiled EXECs is preferred. The only EXECs which are compiled are MCOMP, MCONV, and ACHAMAIN.

5.2.3 RSCS Supplied Samples

For a list of all samples supplied with RSCS, see Appendix B, "Supplied Sample Packages" on page 48.

Note: The CRONOWN and PROFLIST Packages are now longer shipped.

5.2.4 Program Installation / Service Considerations

This section describes items that should be considered before you install or service RSCS.

- RSCS Networking for z/VM is pre-installed in a disabled state on the z/VM System deliverable.

- With the packaging changes introduced to z/VM to provide support for single system image (SSI) cluster, note that **all RSCS service activity now must be performed using the user ID MAINT***vrm* **(e.g. MAINT720).**

- VMSES/E is used to install and service this product.

- If you modify or eliminate any of the IBM-supplied user IDs, minidisk addresses or SFS directory names that are associated with RSCS, you **must** create an appropriate PPF override for the **SERVP2P $PPF** file.

  You also must use the **VMFUPDAT SYSSUF** command to update the VM SYSSUF Software Inventory file, so that your PPF override for SERVP2P PPF is used for automated service processing. For more information about PPF overrides, see the *z/VM: VMSES/E Introduction and Reference*.

- If you choose to move RSCS from minidisk to SFS after initial z/VM installation or if you want to change from the default SFS file pool or directories, then you will need to follow the steps in Appendix C, "Moving RSCS to SFS Directories and Creating a PPF Override" on page 66. These steps will have you create the SFS directories, move the files to the SFS directories and create a PPF override file.

- Recommended Service Upgrades (RSU) will be supplied as necessary. Service between RSUs can be obtained via CORrective service.

5.2.5 User ID Directory Information

Several user directory statements supplied in the 7VMRSC20 PRODPART file have user IDs that have privilege classes other than G. These privilege classes are required for the following reasons:

- The RSCS virtual machine must have class B privilege for any of the following:

  - If the configuration file (RSCS CONFIG) contains a MSGNOH record, or

  - If telecommunication lines and local 3270 printers are attached by ATTACH statements in a PROFILE GCS or issued from the RSCS console.

- The XCHANGE machine must have class B privilege if you wish Data Interchange Manager to issue messages using MSGNOH.

- If you have the RACF® Security Server for z/VM, FL720, feature installed, and you are using the RSCS XCHANGE server the following RAC PERMIT commands must be done by the RACF administrator in order for XCHANGE to operate correctly:

```
RAC Permit XCHANGE class(VMBATCH) id (XCHANGE) acc(control)
RAC Permit RSCS    class(VMBATCH) id (XCHANGE) acc(control)
```

- The RSCSAUTH machine must have class B privilege if you wish RSCSAUTH messages to be issued using MSGNOH.

5.2.6 Program Installation Considerations for RSCS Data Interchange Manager

- If you wish to change the language of messages issued by Data Interchange Manager to uppercase English, then you will need to do the following:

  1. Update the DMTBLELL build list as a local modification changing the line **:PARTID. ACHAMENG TXT** to **:PARTID. ACHAUENG TXT** using LOCALMOD command.

  2. Run SERVICE RSCS BUILD to pick up the changes in the build list.

- The MCOMP EXEC/SEXEC and MCONV EXEC/SEXEC are installed on 7VMRSC20's 400 minidisk, for easier access and maintenance.

- Shared File System directory support has been added for Data Interchange Manager disks (test build, and logging), for the samples packages disks.

- The ACHARSCS LOADLIB has been merged with the new RSCSEXIT LOADLIB.

5.2.7 Program Installation Considerations for RSCS/VTAM Interface

IBM recommends that RSCS system administrators who will be defining and using SNA links should work with the RSCSTAB ASSEMBLE file from the VTAM service ID. After appropriate modification, this file may be assembled and incorporated in a VTAM user load library using VTAM VMSES/E service techniques. See informational APAR II09266 for VTAM VMSES/E tips.

If you are using VTAM you need to create a PPF override to the SERVP2P $PPF (or both the 7VMRSC20 and SERVP2P $PPF files) to add a link to the VTAM disk where the VTAMAC MACLIB resides.

Below is an example of creating a PPF override to add the VTAM minidisk. You can use a filename of your choice and a filetype of $PPF for your override. Compile this override using the VMFPPF command (**VMFPPF** *ppfname compname*). See the *VMSES/E Introduction and Reference* manual for further details on creating PPF overrides.

The following is an example of a PPF override to add the default VTAM V4.2 29A minidisk containing the required MACLIB. The 29A minidisk is owned by the VTAM 5654010A installation user ID.

```
:OVERLST. RSCS
:RSCS. RSCS 7VMRSC20
:DCL. UPDATE
./INSERT &BAS6Z AFTER
&BAS7Z  LINK  5654010A  29A  29A  RR  * VTAM Maclib disk
./END
:EDCL.
:MDA. UPDATE
./INSERT BASE6 AFTER
BASE7  &BAS7Z
./END
:EMDA.
:END.
```

5.3 DASD Storage Requirements

Section 5.3.1, "Required DASD Storage for RSCS" on page 12 lists the user IDs and minidisks which are required to install and service RSCS.

Important Installation Notes:

- All user IDs and minidisks are listed here so that you can get an idea of the resources that are required by RSCS. They are already allocated on the z/VM System deliverable, as RSCS is pre-installed.

- With the exception of the RSCS user ID that owns the service resources (7VMRSC20), **all** the RSCS server virtual machines are defined using multiconfiguration virtual machine definitions. The 7VMRSC20 user ID is defined with a single-configuration virtual machine definition. See *z/VM: CP Planning and Administration* for information on multiconfiguration and single-configuration virtual machine definitions.

- 7VMRSC20 is a default user ID and can be changed. If you choose to change the name of the user ID you need to create a Product Parameter Override (PPF) to change the name.

- Any disk with *NONSFS listed in the SFS 4K block column of Figure 8 on page 12 must remain a minidisk.

- The RSCS production build disks are not shipped as SFS directories. The 401 and 403 production minidisks belong to the RSCS user ID. The XCHANGE user ID has a 191 A-disk. The 403 disk is accessed in the PROFILE EXEC.

5.3.1 Required DASD Storage for RSCS

The following table contains the required DASD for 7VMRSC20 and additional DASD for MAINT in order to install and service RSCS.

Minidisk owner (user ID)	Default Address	Storage in Cylinders		FB-512 Blocks	SFS 4K Blocks	Usage
		DASD	CYLS			Default SFS Directory Name
7VMRSC20	2B2	3390	14	20160	2520	Contains all of the base code shipped with RSCS **VMPSFS:7VMRSC20.RSCS.OBJECT**
7VMRSC20	2B3	3390	22	31680	3960	Contains base assemble, $exec, and other optional source files **VMPSFS:7VMRSC20.RSCS.SOURCE**
7VMRSC20	2C2	3390	1	1440	180	Contains sample files and user local modifications for RSCS **VMPSFS:7VMRSC20.RSCS.LOCALSAM**
7VMRSC20	2D2	3390	25	36000	4500	Contains serviced files. **VMPSFS:7VMRSC20.RSCS.DELTA**
7VMRSC20	2A6	3390	2	2880	360	Contains AUX files and version vector table that represents your test level of RSCS. **VMPSFS:7VMRSC20.RSCS.APPLYALT**
7VMRSC20	2A2	3390	2	2880	360	Contains AUX files and version vector table that represent your production level of RSCS. **VMPSFS:7VMRSC20.RSCS.APPLYPROD**

Figure 8 (Page 1 of 3). DASD Storage Requirements for Required RSCS Minidisks

Notes:

1. Cylinder values defined in this table are based on a 4K block size unless otherwise stated. FB-512 and SFS block values are derived from the 3390 cylinder values in this table.

2. *NONSFS in the SFS 4K block column means that disk cannot be installed to the shared file system and must remain a minidisk. The 400 and 401 minidisks must remain disks since GCS does not support the shared file system.

3. An Asterisk by a cylinder value indicates that this value is additional space that is needed above the default size of that disk.

Figure 8 (Page 2 of 3). DASD Storage Requirements for Required RSCS Minidisks

Minidisk owner (user ID)	Default Address	Storage in Cylinders		FB-512 Blocks	SFS 4K Blocks	Usage
		DASD	CYLS			Default SFS Directory Name
7VMRSC20	29D	3390	8	11520	1440	Contains American English help files for RSCS. **VMPSFS:7VMRSC20.RSCS.HELP**
7VMRSC20	400	3390	13	18720	*NONSFS	Test disk for RSCS server
7VMRSC20	402	3390	3	4320	540	Test disk for RSCS Data Interchange Manager, RSCSSDNS and RSCSAUTH servers **VMPSFS:7VMRSC20.RSCS.XCHTEST**
7VMRSC20	406	3390	8	11520	1440	Contains sample exit packages and usability execs **VMPSFS:7VMRSC20.RSCS.PACKAGE**
7VMRSC20	493	3390	2	2880	360	Dump viewing facilities files for RSCS
7VMRSC20	191	3390	9	12960	1620	7VMRSC20 user ID's 191 minidisk **VMPSFS:7VMRSC20.**
RSCS	401	3390	18	25920	*NONSFS	Production disk for RSCS server, also RSCS user ID's 191 disk
RSCS	403	3390	6	8640	*NONSFS	Production disk for RSCS Data Interchange Manager, RSCSDSN, and RSCSAUTH servers
MAINT	193 and 493	3390	1*	1440	180	Production disk containing Dump Viewing Facilities for RSCS

Notes:

1. Cylinder values defined in this table are based on a 4K block size unless otherwise stated. FB-512 and SFS block values are derived from the 3390 cylinder values in this table.

2. *NONSFS in the SFS 4K block column means that disk cannot be installed to the shared file system and must remain a minidisk. The 400 and 401 minidisks must remain disks since GCS does not support the shared file system.

3. An Asterisk by a cylinder value indicates that this value is additional space that is needed above the default size of that disk.

Figure 8 (Page 3 of 3). DASD Storage Requirements for Required RSCS Minidisks						
Minidisk owner (user ID)	Default Address	Storage in Cylinders		FB-512 Blocks	SFS 4K Blocks	Usage
		DASD	CYLS			Default SFS Directory Name
MAINT	19D	3390	8*	11520	*NONSFS	Production disk containing American English help files for RSCS.
MAINT	402	3390	8*	11520	*NONSFS	Production disk containing uppercase English helps file for RSCS.

Notes:

1. Cylinder values defined in this table are based on a 4K block size unless otherwise stated. FB-512 and SFS block values are derived from the 3390 cylinder values in this table.

2. *NONSFS in the SFS 4K block column means that disk cannot be installed to the shared file system and must remain a minidisk. The 400 and 401 minidisks must remain disks since GCS does not support the shared file system.

3. An Asterisk by a cylinder value indicates that this value is additional space that is needed above the default size of that disk.

The following table contains the DASD requirements for the RSCS Data Interchange Manager (XCHANGE) user ID.

Figure 9. DASD Storage Requirements for Data Interchange Manager Minidisks						
Minidisk owner (user ID)	Default Address	Storage in Cylinders		FB-512 Blocks	SFS 4K Blocks	Usage
		DASD	CYLS			Default SFS Directory Name
RSCS	403	3390	6	4320	540	Production disk for RSCS Data Interchange Manager, RSCSDSN, and RSCSAUTH servers
XCHANGE	191	3390	10	14400	1800	Server's 191 minidisk **VMSYS:XCHANGE.**
XCHANGE	5BF	3390	3	4320	540	Production log disk for the XCHANGE server. **VMSYS:XCHANGE.LOG**

Notes:

1. Cylinder values defined in this table are based on a 4K block size unless otherwise stated.

2. The RSCS 403, XCHANGE 191, and XCHANGE 5BF minidisks are not optional if using the Data Interchange Manager server.

The following table contains the DASD requirements for the RSCSDNS user ID.

Figure 10. DASD Storage Requirements for the RSCSDNS user ID						
Minidisk owner (user ID)	**Default Address**	**Storage in Cylinders**		**FB-512 Blocks**	**SFS 4K Blocks**	**Usage**
		DASD	**CYLS**			**Default SFS Directory Name**
RSCSDNS	191	3390	1	1440	*NONSFS	Server's 191 minidisk.
Notes:						
1. *NONSFS in the SFS 4K block column means that disk cannot be installed to the shared file system and must remain a minidisk. The 400 and 401 minidisks must remain disks since GCS does not support the shared file system.						

The following table contains the DASD requirements for the RSCSAUTH user ID.

Figure 11. DASD Storage Requirements for the RSCSAUTH user ID						
Minidisk owner (user ID)	**Default Address**	**Storage in Cylinders**		**FB-512 Blocks**	**SFS 4K Blocks**	**Usage**
		DASD	**CYLS**			**Default SFS Directory Name**
RSCSAUTH	191	3390	10	14400	*NONSFS	Server's 191 minidisk.
Notes:						
1. *NONSFS in the SFS 4K block column means that disk cannot be installed to the shared file system and must remain a minidisk. The 400 and 401 minidisks must remain disks since GCS does not support the shared file system.						

6.0 Installation Instructions

RSCS is pre-installed in a disabled state on the z/VM System deliverable.

This chapter describes the procedures to complete the RSCS customization.

Each step of the instructions must be followed. Do not skip any step unless directed. All instructions showing accessing of disks assumes the use of default minidisk addresses or SFS directories. If different minidisk addresses or SFS directory names are used, change the instructions appropriately.

Note!

The sample console output presented throughout these instructions was produced on a z/VM V7.2 system using minidisks.

6.1 VMSES/E Installation Process Overview

The following is a brief description of the main steps to complete the enablement and customization of RSCS.

Did you do an upgrade installation?

If you used the upgrade installation procedure documented in the *z/VM: Installation Guide* to upgrade a z/VM V6.4 or V7.1 system with RSCS enabled to a z/VM V7.2 system, no further enablement or customization is necessary. Your installation of RSCS is complete. Proceed to Section 7.

RSCS 720 Licensing Details

          ]

- If installing z/VM, and you **are already** licensed for RSCS, you need to complete all of the steps in this chapter.

- If installing z/VM, and you **are not** licensed for RSCS, the installation of RSCS is complete. You will only need to complete 6.5, "Place RSCS into Production" on page 24 then continue with the following:

  – Review the "Printing with the RSCS Server" chapter of the *TCP/IP for VM Planning and Customization* manual.

  – Make sure the GCS recovery machine is autologged by the TCPIP server (the TCPIP configuration file has an autolog statement for GCS).

  – Make sure the RSCS, RSCSDNS, and RSCSAUTH server's are autologged by the GCS recovery machine (the PROFILE GCS file has an autolog statement for RSCS, RSCSDNS, and RSCSAUTH).

- Enable RSCS.

  This will allow RSCS Networking for z/VM to fully run.

- Perform Post-installation Tasks

  Information about file tailoring and initial activation of the program is presented in 6.4, "Post Installation" on page 19.

- Place the RSCS Files into Production

  Once the product files have been tailored and the operation of RSCS is satisfactory, the product files are copied from the test Build disk(s) or directories to production Build disk(s) or directories.

For a complete description of all VMSES/E installation options refer to *VMSES/E Introduction and Reference* manual.

6.2 Enable RSCS for Use

1 In order to use RSCS once you have acquired a license for it, you need to follow the instructions in the ***MEMO TO USERS for IBM Remote Spooling Communications Subsystem (RSCS) Networking for z/VM, function level 720*** to enable it for use.

Once you have completed the enablement instructions in the MEMO TO USERS you need to return to this program directory and continue with the next step.

2 Run PUT2PROD to place any outstanding RSCS service, such as a previously applied RSU, into production.

If you are running in an SSI cluster you need to run PUT2PROD on every member before continuing with rest of these instructions. You need to do this in order to enable RSCS on the other members.

put2prod rscs

6.3 Local Modifications to RSCS (Optional)

If no local modifications are needed to RSCS, continue with 6.4, "Post Installation" on page   19

If any local modifications to RSCS are needed at this time, refer to chapter 3 in the *Service Guide*. Follow the steps that are applicable for your local modification.

The following substitutions need to be made in the *Service Guide* when doing local modifications to RSCS:

- *compname* should be **RSCS**

- *partfn* and *partft* should be file name and file type of the source part that is to be modified.

A couple of things that you need to keep in mind are:

- When you finish the local modification steps in the *Service Guide* you should return back to this program directory at 6.4, "Post Installation" on page 19.

- RSCS languages are compiled using the MCOMP EXEC or MCOMV EXEC. For information on MCOMP or MCONV see the *VM/RSCS Exit Customization* manual).

- If you wish to use one of your own exits instead of a sample one provided by IBM, then you can do so in a couple of different ways:

   1. Add your exits to the DMTBLELL build list as a local modification and rebuild the RSCSEXIT LOADLIB.

   2. Build your own exit LOADLIB and add it to the list of LOADLIBs specified on the GLOBAL statement of the PROFILE GCS file.

- If you wish to change the language of messages issued by Data Interchange Manager to uppercase English, then you will need to do the following:

   1. Update the DMTBLELL build list as a local modification changing the line **:PARTID. ACHAMENG TXT** to **:PARTID. ACHAUENG TXT**.

   2. Run SERVICE BUILD to pick up the changes in the build lists.

- If you are assembling RSCS parts that require VTAM MACLIBs, then ensure the VTAM minidisk containing the VTAMMAC MACLIB is linked and accessed manually or by using the PPF override

described in section 5.2.7, "Program Installation Considerations for RSCS/VTAM Interface" on page 10.

6.4 Post Installation

This section is required. You will setup the RSCS server machines with RSCS code by copying sample files to their production locations. Additionally you will tailor the server machines for your operating environment. Note that there is no setup required for the RSCSDNS user ID.

For a list of all sample configuration files and exit packages supplied with RSCS, see Appendix B, "Supplied Sample Packages" on page 48. These samples will be referenced during the following post installation tailoring steps. This section will have you copy some of the sample files to a form usable by RSCS. For example, the RSCS CONFSAMP file becomes RSCS CONFIG in its usable form.

6.4.1 Setup the RSCS Server Machines (Initial Installation)

If you are installing RSCS for the first time you will need to copy and tailor sample profile and configuration files to the default server disks for each program that you will be using. You will have to setup the RSCS server machine and then optionally setup the XCHANGE and the RSCSAUTH server machines, based on the functions you want to use.

If you are running in an SSI cluster you need to repeat all the steps that you do on every member in the cluster, unless otherwise directed not to.

Setup the RSCS server machine:

- 6.4.1.1, "Setup the RSCS Virtual Machine"

Setup one or both of the following server machines based on the functions that you will be using:

- 6.4.1.2, "Setup the XCHANGE Virtual Machine (Optional)" on page 21

- 6.4.1.3, "Setup the RSCSAUTH Virtual Machine (Optional)" on page 23

6.4.1.1 Setup the RSCS Virtual Machine

1 Log on to 7VMRSC20.

2 If the Software Inventory disk (51D) was accessed R/O (read only) then establish write access to the Software Inventory disk.

Note: If another user already has the MAINT720 51D minidisk linked in write mode (R/W), you will only obtain read access (R/O) to this minidisk. If this occurs, you will need to have that user re-link the 51D in read-only mode (RR), and then re-issue the following LINK and ACCESS commands. Do not continue with these procedures until a write link is established to the 51D minidisk. Do not use *mw* mode.

link maint720 51d 51d mr   The MAINT720 51D disk is where the VMSES/E
access 51d d   system level software inventory files reside.

3 Setup the required access order.

vmfsetup 7VMRSC20 {RSCS|RSCSSFS} Use component name **RSCS** if installed using minidisks or **RSCSSFS** if installed using SFS.

4 Access the RSCS samples.

a If installed using minidisks

access 406 t The sample files were loaded to the 406 minidisk.

b If installed using SFS

access VMPSFS:7VMRSC20.RSCS.PACKAGE t The sample files were loaded to the SFS directory.

5 Access the RSCS production disk (401).

access 401 v RSCS links the RSCS's 401 minidisk as its 191 minidisk. Sample files will be copied to their usable form on this disk.

6 Copy the sample files to the 401 minidisk.

copyfile rscs confsamp t = config v (olddate

copyfile profile gcssamp t = gcs v (olddate replace The 401 disk already contains a preprimed PROFILE GCS file that includes a link and access to the TCP/IP configuration minidisk, TCPMAINT 198. If this link is not required, then copy the RSCS sample as the PROFILE GCS.

copyfile nothere tempsamp t = template v (olddate

copyfile unknown tempsamp t = template v (olddate

7 Tailor each of the following files you copied to the 7VMRSC20 401 disk in the previous step:

- RSCS CONFIG
- PROFILE GCS
- NOTHERE TEMPLATE
- UNKNOWN TEMPLATE

See "Configuring RSCS" in the *z/VM: RSCS Networking Planning and Configuration* for details on tailoring these files.

8 Tailor the SYSTEM NETID file.

The SYSTEM NETID file that resides on MAINT720's 490 and MAINT's 190 disks needs to be updated with the CPUID, system node id and RSCS server machine user ID. You must log on to MAINT720 to do this. Don't forget that you will need to rebuild the CMS and ZCMS saved systems after you make your changes. For information about the SYSTEM NETID file refer to the *z/VM: CMS Planning and Administration.* For information on rebuilding CMS and ZCMS saved systems see the *z/VM: Service Guide.*

6.4.1.2 Setup the XCHANGE Virtual Machine (Optional)

If you want to use the Data Interchange Manager function of RSCS then you need to do the following steps to set it up.

1 Log on to 7VMRSC20.

2 Setup the required access order.

vmfsetup 7VMRSC20 {RSCS|RSCSSFS}   Use component name **RSCS** if installed using minidisks or **RSCSSFS** if installed using SFS.

3 Access the RSCS samples.

    a If installed using minidisks

access 406 t   The sample files were loaded to the 406 minidisk.

    b If installed using SFS

access VMPSFS:7VMRSC20.RSCS.PACKAGE t   The sample files were loaded to the SFS directory.

4 Access the RSCS production disk (401).

access 401 v   RSCS links the RSCS's 401 minidisk as its 191 minidisk. Sample files will be copied to their usable form on this disk for the RSCS Data Interchange Manager.

5 Access the XCHANGE user ID 191 disk or directory. The sample files must be copied to their usable form on this disk.

a If installed using minidisks

link XCHANGE 191 991 mr
access 991 u

b If installed using SFS

access VMSYS:XCHANGE. u

6 The ACHAMAIN EXEC is shipped interpretive (filetype = SEXEC) and
compiled (filetype = EXEC). If you would rather use the interpretive exec
instead of compiled, copy the SEXEC as EXEC on the Data Interchange
Manager test disk or SFS directory. Otherwise skip this step.

a If installing using minidisks

access 402 w
copy achamain sexec w = exec = (rep oldd

b If installing using SFS

access VMPSFS:7VMRSC20.RSCS.XCHTEST w
copy achamain sexec w = exec = (rep oldd

7 Copy the sample Data Interchange Manager files to the RSCS production
disk (RSCS 401) and the XCHANGE A-disk (XCHANGE 191) or equivalent
SFS directories.

copyfile profile execsamp t = exec u (olddate

copyfile xchange confsamp t = config u (olddate

copyfile achafail tempsamp t = template u (olddate

copyfile acharscs confsamp t = config v (olddate

8 Tailor the following files:

XCHANGE CONFIG is located on the XCHANGE 191 minidisk. Ensure
DOMAIN and RSCSLINK are specified and contain the correct
information. See the 'Configuring RSCS Interchange' section of the
"Setting up RSCS Data Interchange Manager" chapter in the *z/VM:
RSCS Networking Planning and Configuration*, for specific information.

PROFILE EXEC is located on the XCHANGE 191 minidisk or VMSYS:XCHANGE. directory. Add any Data Interchange Manager server profile information as appropriate for your system, such as special links, accesses and console setup. If you installed RSCS using SFS, you will need to update the PROFILE EXEC to access the XCHANGE log directory (VMSYS:XCHANGE.LOG) instead of the 5BF minidisk as filemode B.

ACHAFAIL TEMPLATE is located on the XCHANGE 403 minidisk. Change "support person" to the user ID of the system administrator for Data Interchange Manager.

ACHARSCS CONFIG is located on the RSCS 401 minidisk. Ensure the LINKDEF, LINKTYPE, and PARM statements reflect the linkid of the Data Interchange Manager link from RSCS.

RSCS CONFIG is located on the RSCS 401 minidisk. Place an IMBED ACHARSCS CONFIG statement at the bottom of the configuration file, or copy the ACHARSCS CONFIG file into the RSCS configuration file.

PROFILE GCS is located on the RSCS 401 minidisk. Ensure the GLOBAL LOADLIB statement contains the RSCSEXIT loadlib:

GLOBAL LOADLIB ... RSCS RSCSEXIT ...

See the "Setting UP RSCS Data Interchange Manager" chapter in the *z/VM: RSCS Networking Planning and Configuration* manual for details on modifying these files.

6.4.1.3 Setup the RSCSAUTH Virtual Machine (Optional)

If you want to use the Dynamic Authorization function of RSCS then you need to do the following steps to set it up.

1 Log on to 7VMRSC20.

Note: The resources required for the XCHANGE server machine, as documented in Figure 9 on page 14, were already setup on the z/VM System deliverable.

2 Setup the required access order.

vmfsetup 7VMRSC20 {RSCS|RSCSSFS}   Use component name **RSCS** if installed using minidisks or **RSCSSFS** if installed using SFS.

3 Access the RSCS samples.

a If installed using minidisks

access 406 t　　　　　　　　　　　　　　　　　The RSCSAUTH sample configuration file was loaded to the 406 minidisk.

b If installed using SFS

access VMPSFS:7VMRSC20.RSCS.PACKAGE t　　　The RSCSAUTH sample configuration file was loaded to the SFS directory.

4 Access the RSCSAUTH user ID 191 disk. The RSCSAUTH sample configuration file must be copied to this disk.

link RSCSAUTH 191 891 mr
access 891 w
copyfile rscsauth confsamp t = config w (oldd

5 Tailor the RSCSAUTH CONFIG file that you just copied. See "Setting Up RSCS Dynamic Authorization" in the *z/VM: RSCS Networking Planning and Configuration* for details on configuring this file.

What's Next?

You have now finished tailoring the RSCS virtual machines. Continue with Appendix A, "Test the Installation/Service for RSCS" on page 28. You will return to 6.5, "Place RSCS into Production" to initalize the RSCS server machines.

6.5 Place RSCS into Production

Important note

This procedure should only be done after you have successfully tested RSCS installation.

Bring up your server machines by logging on to them. Logging on to them will restart them with the production code. First ensure that the user IDs 7VMRSC20 and MAINT720 are not logged on.

If you are running in an SSI cluster then you need to log on to the RSCS server machines on every member.

6.5.1 Initialize or Reinitialize the RSCS Server Machines

The server machines must be reinitialized in order for them to use the new production code.

6.5.1.1 Reinitialize the RSCS Server Machine

1 Log on to RSCS.

2 Shutdown the RSCS server machine and restart it.

rscs shutdown cp i gcs

3 Disconnect from the server machine.

rscs disc

The server is now ready for use.

6.5.1.2 Reinitialize the XCHANGE Server Machine, if using it.

1 Log on to XCHANGE.

2 Shutdown the XCHANGE server machine.

stop

3 IPL CMS to reset the server machine.

ipl cms

4 Disconnect from the server machine.

#cp disc

The server is now ready for use.

6.5.1.3 Reinitialize the RSCSAUTH Server Machine, if using it.

1 Log on to RSCSAUTH

2 Shutdown the RSCSAUTH server machine.

stoprscsauth immed

3 IPL CMS to reset the server machine.

ipl cms

4 Disconnect from the server machine.

#cp disc

The server is now ready for use.

6.5.1.4 Reinitialize the RSCSDNS Server Machine

1 Log on to RSCSDNS.

2 IPL CMS to reset the server machine.

#cp ipl cms

3 Disconnect from the server machine.

#cp disc

The server is now ready for use.

> **The RSCS product is now installed and built on your system.**

7.0 Service Instructions

7.1 Servicing RSCS

Use the service instructions documented in the *z/VM: Service Guide* to receive, apply, build and place RSCS into production.

If you would like to test the installed service before you place it into production then after the SERVICE command has run you need to continue with Appendix A, "Test the Installation/Service for RSCS" on page 28 in this program directory for the minimum steps necessary to ensure that your new code is functional.

When your testing is complete you will need to return to the *z/VM: Service Guide* and run PUT2PROD to place the service into production.

Appendix A. Test the Installation/Service for RSCS

This appendix is used for testing the initial installation of RSCS and its related server machines. It will also be used prior to placing new service into production. You should follow these steps to test each of the server machines that you are using.

Important Information

RSCS will check if it is enabled during initialization and start command processing. While disabled, **only** support for specific TCP/IP link drivers are available. All other RSCS functions are disabled, and attempts to use them will result in the issuance of either message DMT257I or DMT258I. If you receive either of these messages and you are licensed for RSCS, then you need to complete the RSCS enablement steps starting with step 1 on page 17.

Notes

1. This procedure will require the RSCS server machines to be shutdown. Therefore, you should only test when it will least disrupt your production environment.

2. The install ID does not need to be logged off during testing as the server machines only need R/O links to its disks.

3. Make sure that the GCS server machine has been autologged and RSCS properly authorized to GCS.

4. Once these instructions have been completed, logging the servers off and back on will cause them to be running the old level of RSCS code.

5. A successful installation of RSCS does not mean that your customization is correct. The installation complete messages only mean that everything has been properly installed onto the disk (or disks).

6. If running in an SSI cluster, you should repeat these test instructions on each RSCS node in the SSI cluster.

7. Follow the instructions and enter the commands, as shown after each **Step**, substituting *variable* information where required.

A.1 Test the RSCS Server Machine

This procedure will test the new RSCS code to see that it functions properly. You will log the RSCS server machine on and access the appropriate disks.

The procedures for each part depend on your implementation of the product. Because every customization is different, examples are used that correspond to the sample configuration file shown in the

z/VM: RSCS Networking Planning and Configuration book. Note that the messages you see may differ from those shown in this section if your link definitions differ from the IBM sample link definitions. Beyond that, this section offers general guidelines to help you get started.

Notes:

1. The command prefix `'RSCS'` is used in the command examples shown in this section. The command prefix is determined by the name you specified in the PROFILE GCS for DMTMAN on the LOADCMD statement. The sample PROFILE GCS shipped with RSCS specifies `'RSCS'` as the command prefix. See the *z/VM: RSCS Networking Operation and Use* book for more information.

1 Log on to RSCS server user ID **RSCS**.

The RSCS virtual machine should be running GCS (if just logging on it should have IPLed GCS). In addition, the PROFILE GCS should have the following record entries.

- a GLOBAL LOADLIB for the RSCS (and optionally RSCSEXIT) LOADLIB
- LOADCMD RSCS DMTMAN
- RSCS INIT

2 Shutdown the RSCS server machine.

This command shuts down any active links, sessions, and RSCS itself. Because the QUICK operand is not used, RSCS will shut down links after all active files have finished transmission.

Notes:

a. Use care when issuing the SHUTDOWN command. If you accidentally enter it *without* the appropriate prefix, it is treated as a CP command and passed to CP for execution. Extreme caution must be used with CP privilege classes on the RSCS machine so that you do not accidentally shutdown your VM system.

b. If the RSCS SHUTDOWN command is rejected or an unknown command, then RSCS is not running and you can skip to step 4 on page 30.

rscs shutdown

This command also produces messages along the way.

a For each link that has been started you will see:

```
14:48:54 DMTMAN002I Link linkid deactivated
```

b If the RSCS/VTAM interface had been started, you will see:

```
14:48:54 DMTSCT772I RSCS/VTAM interface stopping
14:48:54 DMTSCT773I RSCS/VTAM interface stopped
```

c And finally, you would see:

```
14:48:54 DMTPRD779I TCP Port redirector stopped
14:48:54 DMTMAN100I RSCS Networking terminated
```

3 Remove the old RSCS code from memory.

hx

4 Access the test Build disk.

link 7VMRSC20 400 *vaddr* **rr**   *vaddr* is any free virtual address. This disk
access *vaddr* **a**   contains the code to be tested. It needs to be
                              accessed ahead of the RSCS 191 minidisk which
                              contains the production code.

5 Access the RSCS production disk as 191.

detach 191   The RSCS 401 minidisk contains the production
link RSCS 401 191 mr   code and configuration files which must be
access 191 c   accessed after the test Build disk. This is to allow
                              the new RSCS code to be executed for testing.

6 Bring up RSCS on the server machine.

If RSCS finds any errors in configuration file statements or in starting links,
you will see error messages explaining the problem (or problems). For
example, if you requested RSCS to use the MSGNOH command, but the
USER statement for RSCS in the directory did not specify the correct
privilege class, an error will result.

The RSCS load address and address range displayed when starting RSCS
help to diagnose any RSCS system problems that might arise later. To
display the RSCS load address and address range after installation, use the
RSCS QUERY SYSTEM LOADADDRESS command described in the *z/VM:
RSCS Networking Operation and Use* book.

profile

```
     ⋮
14:48:54 DMTMAN010I RSCS Networking loaded at 0001A000-000EC080,
CVT at 0001C6E0, initialization time was 04/04/18 14:48:54
14:48:54 DMTPRD778I TCP Port redirector ready
     ⋮
14:48:54 DMTMAN000I RSCS Networking Function Level 720-yynn ready
Ready;
```

a If your GCS profile initiates communications with VTAM, you will see the following messages:

```
14:48:54 DMTSCT770I RSCS/VTAM interface starting
14:48:54 DMTAXM109I File queue reordered
14:48:54 DMTSCT771I RSCS/VTAM interface ready
```

If your GCS profile does not start communications with VTAM and you wish to do so, issue the following command:

rscs network start

b If your GCS profile calls an exec to start various links, you will see one of the following messages when each link starts:

1 Non-SNA link:

```
14:48:54 DMTCMY700I Activating link linkid type line=nnnn class=c queuing=qtype
```

2 SNA link:

```
14:48:54 DMTCMY700I Activating link linkid type LUNAME=luname class=c
queuing=qtype LOGMODE=logmode
```

The variable data includes the following:

- Link ID
- Link type
- Virtual line address (non-SNA) or logical unit name (SNA)
- Class of files the link will handle
- Queueing type (FIFO, priority, or size)
- Logmode name (SNA only).

Check to see whether the information in the message text matches what you expected (as specified on LINKDEFINE or LINK statements in your configuration file).

c For each printer and workstation link started, you will see the following message:

```
14:48:54 DMTAXM109I File queue reordered
```

d For each system and workstation link which receives a signon request from the remote node, you will see the following message:

```
Signon of link linkid complete, buffer size=nnnn
```

7 Issue various RSCS Query commands.

The QUERY command has many operands, filters, and SHOW options that let you display information about a link and the RSCS system in general. For example, you can use the QUERY *linkid* command to find out information about a specific link, the QUERY QUEUES command to see a list of files in the link's file queue, and so forth. See the *z/VM: RSCS Networking Operation and Use* book for a description of the QUERY command and instructions on how to use it.

a Query the RSCS service level.

rscs query system level
yynn will be the year and number of the latest RSU applied to RSCS. If *0000* is displayed, then there have not been any RSUs applied to RSCS.

```
14:48:54 RSCS Networking Function Level 720-yynn
Ready;
```

b Query the status of RSCS/VTAM interface.

rscs query system network

1 If your GCS profile did not initiate communications with VTAM, you will see the following message:

```
14:48:54 RSCS/VTAM interface stopped
Ready;
```

2 If your GCS profile initiates communications with VTAM, you will see the following message:

```
14:48:54 RSCS/VTAM interface ready
Ready;
```

    c Query the status of the RSCS TCP port redirector task.

rscs query system tcpip

```
14:48:54 TCP Port redirector ready
Ready;
```

    d Query all system links.

This will give you a message about each link you have defined to RSCS. Check to see that all links are present and appear as you expected (from LINKDEFINE or LINK statements in your configuration file).

For each link, RSCS displays the current status (active, connect, inactive, and so forth).

Note: You may not want to perform this step if many RSCS links are defined at your installation.

rscs query system links

    1 If you did not define any links in your configuration file, you will see:

```
14:48:54 No links defined
Ready;
```

    2 Otherwise you will see something similar to the following:

```
14:48:54 Link                       Line
14:48:54 Name     Status   Type     Addr LU Name  Logmode   Queueing
14:48:54 BOSTON   inactive SNANJE   0000 TN2RSCS  ...       size
14:48:54 CHICAGO  inactive SNANJE   0000 NO51ZRSC RSCSNJE0  size
14:48:54 CLEVELND inactive SNANJE   0000 TNARSCS  ...       size
14:48:54 DALLAS   inactive SNANJE   0000 TNHRSCS  ...       size
14:48:54 LONDON   inactive SNANJE   0000 TNBRSCS  ...       size
14:48:54 RALEIGH  inactive SNANJE   0000 TN7RSCS  RSCS07    size
14:48:54 TOKYO    inactive SNANJE   0000 QHARSCS  RSCSNJE0  size
14:48:54 TORONTO  inactive SNANJE   0000 OVCVRSCS RSCSNJE0  size
14:48:54 NYDEVSYS inactive NJE      00A4 ...       ...       size
14:48:54 RESLAB   inactive NJE      0581 ...       ...       size
14:48:54 HQUARTRS inactive SNANJE   0000 WZ2RSCS  RSCSNJE0  size
14:48:54 ENDICOTT inactive TCPNJE   0000 ...       ...       size
14:48:54 GLENDALE inactive TCPNJE   0000 ...       ...       size
14:48:54 *LIST    inactive LISTPROC 0000 ...       ...       size
14:48:54 *UNKNOWN inactive NOTIFY   0000 ...       ...       FIFO
14:48:54 *NOTHERE inactive NOTIFY   0000 ...       ...       FIFO
14:48:54 LNKMRJE  inactive MRJE     0002 ...       ...       size
14:48:54 LNKRJE   inactive RJE      0003 ...       ...       size
14:48:54 PRT3812A inactive 3270P    0DFA ...       ...       size
14:48:54 PRT3812B inactive 3270P    0DFB ...       ...       size
14:48:54 PRT3812C inactive 3270P    0DFC ...       ...       size
14:48:54 PRT38001 inactive SNA3270P 0000 PRT1RSCS SCS3800   size
14:48:54 PRT38002 inactive SNA3270P 0000 PRT2RSCS SCS3800   size
14:48:54 PRT38003 inactive SNA3270P 0000 PRT3RSCS SCS3800   size
14:48:54 PRT3820A inactive SNA3270P 0000 PRTARSCS SCS3820   size
14:48:54 PRT3820B inactive SNA3270P 0000 PRTBRSCS SCS3820   size
14:48:54 PRT3820C inactive SNA3270P 0000 PRTCRSCS SCS3820   size
14:48:54 PRT4250A inactive SNA3270P 0000 ACRCRSCS SCS4250   FIFO
14:48:54 PRT4250B inactive SNA3270P 0000 BCRCRSCS SCS4250   FIFO
14:48:54 PRT4250C inactive SNA3270P 0000 CCRCRSCS SCS4250   FIFO
14:48:54 PROPRINT inactive TCPASCII 0000 ...       ...       FIFO
14:48:54 PROPRNTA inactive TCPASCII 0000 ...       ...       FIFO
14:48:54 PROPRNTB inactive TCPASCII 0000 ...       ...       FIFO
14:48:54 AIXDAEMN inactive LPR      0000 ...       ...       FIFO
14:48:54 34 links found
Ready;
```

e Query all system ports.

This will give you a message about each port you have defined to RSCS. Check to see that all ports are present and appear as expected (from PORT statements defined in your configuration file).

The second column gives you information about the status of each port. This example shows that all three ports are not currently being used. The other states are *disabling*, *enabled* (for auto-answer links), and *in use*.

The QUERY command displays information about the ports that are defined by the PORTS configuration file statement. These are not the ports defined by the PARM statements for various links (for example, TCPASCII or LPR).

Note: You may not want to perform this step if many RSCS ports are defined at your installation.

rscs query system ports

1 If you did not define any ports in your configuration file, you will see:

```
14:48:54 No ports available
Ready;
```

2 Otherwise you will see something similar to the following:

```
14:48:54    Port          Auto
14:48:54 Address State     Dial Trace Link
14:48:54    0080 free      no   none  ...
14:48:54    0081 free      no   none  ...
14:48:54    0082 free      yes  none  ...
14:48:54 3 ports found
Ready;
```

f Query all link defaults.

This will give you a message about each link you have defined to RSCS and the associated link default definitions. Check to see that all links are present and appear as you expected (from LINKDEFINE or LINK statements in your configuration file).

For each link, RSCS displays defaults such as type, line address, SNA LU name, SNA logmode, transmission spool class, type of queuing, and dispatching priority.

Note: You may not want to perform this step if many RSCS links are defined at your installation.

rscs query system links show default

1 If you did not define any links in your configuration file, you will see:

```
14:48:54 No links defined
Ready;
```

2 Otherwise you will see something similar to the following:

```
14:48:54                                                           Default
14:48:54 Link     Default Def Default  Default Def Default  Dispatch
14:48:54 Name     Type    Line LU Name Logmode Class Queueing Priority
14:48:54 BOSTON   SNANJE  0000 TN2RSCS ...      *    size          5
14:48:54 CHICAGO  SNANJE  0000 NO51ZRSC RSCSNJE0 *   size          5
14:48:54 CLEVELND SNANJE  0000 TNARSCS ...      *    size          5
14:48:54 DALLAS   SNANJE  0000 TNHRSCS ...      *    size          5
14:48:54 LONDON   SNANJE  0000 TNBRSCS ...      *    size          5
14:48:54 RALEIGH  SNANJE  0000 TN7RSCS RSCS07   *    size          5
14:48:54 TOKYO    SNANJE  0000 QHARSCS RSCSNJE0 *    size          5
14:48:54 TORONTO  SNANJE  0000 OVCVRSCS RSCSNJE0 *   size          5
14:48:54 NYDEVSYS NJE     00A4 ...      ...      *    size          5
14:48:54 RESLAB   NJE     0581 ...      ...      *    size          4
14:48:54 HQUARTRS SNANJE  0000 WZ2RSCS RSCSNJE0 *    size          5
14:48:54 ENDICOTT TCPNJE  0000 ...      ...      *    size          5
14:48:54 GLENDALE TCPNJE  0000 ...      ...      *    size          5
14:48:54 *LIST    LISTPROC 0000 ...     ...      *    size          5
14:48:54 *UNKNOWN NOTIFY  0000 ...      ...      *    FIFO          5
14:48:54 *NOTHERE NOTIFY  0000 ...      ...      *    FIFO          5
14:48:54 LNKMRJE  MRJE    0002 ...      ...      *    size          5
14:48:54 LNKRJE   RJE     0003 ...      ...      *    size          5
14:48:54 PRT3812A 3270P   0DFA ...      ...      *    size          5
14:48:54 PRT3812B 3270P   0DFB ...      ...      *    size          5
14:48:54 PRT3812C 3270P   0DFC ...      ...      *    size          5
14:48:54 PRT38001 SNA3270P 0000 PRT1RSCS SCS3800 *   size          5
14:48:54 PRT38002 SNA3270P 0000 PRT2RSCS SCS3800 *   size          5
14:48:54 PRT38003 SNA3270P 0000 PRT3RSCS SCS3800 *   size          5
14:48:54 PRT3820A SNA3270P 0000 PRTARSCS SCS3820 *   size          5
14:48:54 PRT3820B SNA3270P 0000 PRTBRSCS SCS3820 *   size          5
14:48:54 PRT3820C SNA3270P 0000 PRTCRSCS SCS3820 *   size          5
14:48:54 PRT4250A SNA3270P 0000 ACRCRSCS SCS4250 *   FIFO          5
14:48:54 PRT4250B SNA3270P 0000 BCRCRSCS SCS4250 *   FIFO          5
14:48:54 PRT4250C SNA3270P 0000 CCRCRSCS SCS4250 *   FIFO          5
14:48:54 PROPRINT TCPASCII 0000 ...     ...      *    FIFO          5
14:48:54 PROPRNTA TCPASCII 0000 ...     ...      *    FIFO          5
14:48:54 PROPRNTB TCPASCII 0000 ...     ...      *    FIFO          5
14:48:54 AIXDAEMN LPR     0000 ...      ...      *    FIFO          5
14:48:54 34 links found
Ready;
```

g Query destination identifiers.

This will give you a message for each PSF destination defined to RSCS in the DEST file. Check to see that all the destination identifiers are present (from DEST statements in your configuration file or from entries in your destination identifier file).

Note: You may not want to perform this step if many identifiers are defined at your installation.

rscs query system dest

1 If you did not define any destination identifiers, you will see:

```
14:48:54 No destination identifiers defined
Ready;
```

2 Otherwise you will see something similar to the following:

```
14:48:54 PSF
14:48:54 Destination
14:48:54 PSFPRT1
14:48:54 PSFPRT2
14:48:54 PSFPRT3
14:48:54 PSFPRT4
14:48:54 PSFPRT5
14:48:54 5 dests found
Ready;
```

h Query exit points

This will give you a message for each exit point defined to RSCS.
Check the addresses at which RSCS loaded the various exit routines
and compare the difference to the size of your load module. The
address of the entry points should relate to the location of the entry
points in the source module. If not, the entry points are in separate
copies of the load module.

rscs query system exits

1 If you did not define any exits in your configuration file, you will
see:

```
14:48:54 No exit routines loaded
Ready;
```

2 Otherwise you will see:

```
14:48:54 Exit       Entry Point
14:48:54 Number Name      Address  Status
14:48:54       0 SSSECU00 01221016 on
14:48:54       1 SSSECU01 012212B8 on
14:48:54       2 SASPOL02 0121FB96 on
14:48:54       3 SASPOL03 0121FC4E on
14:48:54       4 SASPOL04 0121FCF0 on
14:48:54       5 SASPOL05 0121FD96 on
14:48:54      14 SSSECU14 01221382 on
14:48:54      15 SSSECU15 01221588 on
14:48:54      19 SSSECU19 012217CC on
14:48:54      21 SSSECU21 01221ABC on
14:48:54      32 SSSECU32 01221C08 on
14:48:54 11 exits found
Ready;
```

8 Disconnect the RSCS user ID.

rscs disc

If you defined any system-authorized or link-authorized alternate operators in your configuration file, have them try to perform some privileged operations.

9 Logon to a separate user ID which is authorized to issue restricted RSCS commands.

From a system-authorized or link-authorized alternate operator, try to perform some privileged operations. Unless specifically authorized, system-authorized alternate operators should not be able to use the RSCS CP command. Link-authorized alternate operators should be able to enter commands that affect a specific link, but not commands that affect RSCS operation. (The *z/VM: RSCS Networking Operation and Use* book lists the authorization categories for commands.)

    a Test to see that it is possible to communicate over each connected link.

    b Test to see whether messages include CP headers or not (whichever you requested).

smsg rscs msg *nodeid userid* **testing for msgnoh**   Where *nodeid* is the node ID on the RSCS local configuration statement, and *userid* is the user ID you are testing from. If the response includes a CP message header, RSCS is not using MSGNOH and thus is not suppressing CP headers.

If you specified MSGNOH (as recommended), you will see:

```
From nodeid(userid):  TESTING FOR MSGNOH
```

c For printer links, you can send a message to (print at) the printer.
Someone near the device can tell you if the message arrives.

d Try defining some links or routes (using the DEFINE and ROUTE
commands) and verify them (using the QUERY command). Enter some
REROUTE commands and query the results. (See the *z/VM: RSCS
Networking Operation and Use* book for command formats.) For
example, enter the following command:

smsg rscs query system reroutes

1 If you did not define any reroutes in your configuration file or you
used the REROUTE command to remove them, you will see:

```
No reroutes in effect
```

2 Otherwise you will see something similar to the following:

```
      For                       To
Node    User    Type     Node    User    Quiet
DEVSYS   *       all     NYDEVSYS  =       yes
DEVSYS   SYSTEM  commands NYDEVSYS SYSTEM  yes
NEWYORK  OP1     not-rec  NEWYORK  OPER1   yes
NEWYORK  OP2     not-rec  NEWYORK  OPER2   yes
NEWYORK  OP3     not-rec  NEWYORK  OPER3   yes
NEWYORK  JANETM  files    NEWYORK  JANETF  no
6 reroutes found
```

e You can send files back and forth on some links and verify the link
status by entering:

smsg rscs query system queues

```
Link
Name      Status    Sending Receiving Queued Looping Held
BOSTON    connect      0        0        3       3     0
CHICAGO   inactive     0        0        8       0     0
CLEVELND  inactive     0        0        1       0     0
```

> **f** Any other verification you do will depend on your installation's particular setup. Do enough verification to guarantee that RSCS is functioning in your environment the way you planned it.

A.1.1   Restarting RSCS After Modifying Your Configuration

If you need to modify your RSCS configuration (such as to change the definition of a port or link) after starting RSCS, use the following procedure to place the changes online:

> **1** Log on to the 7VMRSC20 user ID.

> **2** Access the 401 minidisk.

access 401 e   The RSCS 401 minidisk is RSCS's 191 minidisk.

> **3** Make the appropriate configuration changes.

> **4** Log off the 7VMRSC20 user ID.

logoff

> **5** Log on to the RSCS virtual machine.

>> **a** If RSCS is running, enter:

rscs shutdown cp ipl gcs

>> **b** If RSCS is not running, enter:

ipl gcs

>> **c** Disconnect from the RSCS virtual machine.

rscs disc

A.2 Test the Data Interchange Manager Server Machine (XCHANGE)

This procedure will test the new Data Interchange Manager code to see that it functions properly. You will log the XCHANGE server machine on and access the appropriate disks. A second user ID is needed in order to verify the Data Interchange Manager server. You will also need to ensure that the paths to RSCS and SMTP are available.

1 Log on to the Data Interchange Manager server user ID **XCHANGE**.

2 Shutdown the XCHANGE server machine.

Note: If you are installing RSCS, the server machine will be just coming up. When it has initialized you then can issue the stop command.

stop

3 Define a temporary minidisk that will be used as XCHANGE's A-disk.

define t_dasd_ _vaddr_ **5**   _dasd_ is the DASD type of the temporary disk that you are going to define.

vaddr is any free virtual address on this user ID.

4 Format the temporary minidisk.

format _vaddr_ **a**   _vaddr_ is the virtual address that you defined.

```
DMSFOR603R FORMAT will erase all files on disk A(vaddr). Do you wish to continue?
Enter 1 (YES) or 0 (NO).
```

1

```
DMSFOR605R Enter disk label:
```

tmp191

```
DMSFOR733I Formatting disk A
DMSFOR732I n {cylinders|blocks} formatted on A(vaddr)
```

5 Detach the current disk or directory used as XCHANGE's log-disk.

a If using minidisks

detach 5BF   The 5BF disk contains the production XCHANGE logging files. It needs to be detached in order to define a temporary one for testing purposes. That way testing logs will not be intermixed with production ones.

b If using SFS

release *logfm*
           logfm is the filemode where the VMSYS:XCHANGE.LOG directory is accessed. This SFS directory contains the production XCHANGE logging files. It needs to be released in order to define a temporary disk for testing purposes. That way testing logs will not be intermixed with production ones.

6 Define a temporary minidisk that will be used as XCHANGE's log-disk.

define t*dasd* **5BF 5**
           dasd is the DASD type of the temporary disk that you are going to define.

7 Format the temporary minidisk.

format 5BF b

```
DMSFOR603R FORMAT will erase all files on disk B(5BF). Do you wish to continue?
Enter 1 (YES) or 0 (NO).
```

1

```
DMSFOR605R Enter disk label:
```

tmp5BF

```
DMSFOR733I Formatting disk B
DMSFOR732I n {cylinders|blocks} formatted on B(5BF)
```

8 Access the test Build disk or directory.

a If using minidisks

link 7VMRSC20 402 *vaddr1* **rr**
access *vaddr1 freefm*
           vaddr1 is any free virtual address. This disk contains the code to be tested. It needs to be accessed ahead of the XCHANGE disk containing the production code. *freefm* is any free access mode for the XCHANGE user ID.

b If using SFS

access VMPSFS:7VMRSC20.RSCS.XCHTEST *freefm* This SFS directory contains the code to be tested. It needs to be accessed ahead of the XCHANGE directory containing the production code. *freefm* is any free access mode for the XCHANGE user ID.

9 Access the production build disk.

access 403 *freefm1*

Where *freefm1* is any free access mode for the XCHANGE user ID. The production Build disk containing the production code and configuration files must be accessed after the test Build disk. This is to allow the new Data Interchange Manager code to be executed for testing.

10 Start the XCHANGE server machine using the new code.

profile

```
   ⋮
ACHAMA010I RSCS Interchange Function Level 720-0000 initializing on 01 Aug 2018 15:22:34
ACHAMA001I Reading configuration file XCHANGE CONFIG *
ACHAMA000I RSCS Data Interchange Manager Function Level 720.yynn ready
   ⋮
```

11 Issue a QUERY command.

query system

yynn will be the year and number of the latest RSU applied to RSCS. If *0000* is displayed, then there have not been any RSUs applied to RSCS.

An example of the system response might be:

```
ACHAMA621I Files processed = 0, rejected = 0
ACHAMA619I Nick Override is All
ACHAMA620I Nick Priv is 'Off'
ACHAMA000I RSCS Data Interchange Manager Function Level 720.yynn ready
```

12 Disconnect the XCHANGE user ID.

#cp disc

13 Log on to any other valid CMS user ID. This needs to be done so that you can send a message through the XCHANGE server.

    a Obtain a list of valid XCHANGE nicknames.

smsg xchange query nick all

> **Note:** If you do not have any nicknames established, you can use the NICK ADD command to add a valid XCHANGE nickname. See *z/VM: RSCS Networking Planning and Configuration*, Chapter 4 "RSCS Data Interchange Manager" under "How Does it Work?", and the "NICK" command in *z/VM: RSCS Networking Operation and Use*, Chapter 15 "RSCS Interchange Commands" for for information on adding nicknames.

    b Send a message to a valid XCHANGE nickname.

note *nickname*   *nickname* is any valid nickname returned by XCHANGE from the Query NICK ALL command.

A.3 Test the RSCS Authorization Server Machine (RSCSAUTH)

This procedure will test the new RSCSAUTH code to see that it functions properly. You will log the RSCSAUTH server machine on and access the appropriate disks. A second user ID is needed in order to verify the RSCS authorization. You will also need to ensure that the RSCS server is available.

1 Log on to the RSCS authorization server user ID **RSCSAUTH**.

2 Shutdown the RSCSAUTH server machine.

Note: If you are installing RSCS, the server machine will be just coming up. When it has initialized you then can issue the stop command.

stoprscsauth

3 Access the test build disk or directory.

    a If using minidisks

link 7VMRSC20 402 *vaddr1* **rr**
access *vaddr1 freefm*

vaddr1 is any free virtual address. This disk contains the code to be tested. It needs to be accessed ahead of the disk containing the RSCSAUTH production code. *freefm* is any free access mode for the RSCSAUTH user ID.

b If using SFS

access VMPSFS:7VMRSC20.RSCS.XCHTEST *freefm* This SFS directory contains the code to be tested. It needs to be accessed ahead of the disk containing the RSCSAUTH production code. *freefm* is any free access mode for the RSCSAUTH user ID.

4 Access the production build disk.

access 403 *freefm1*

Where *freefm1* is any free access mode for the RSCSAUTH user ID. The production Build disk containing the production code and configuration files must be accessed after the test Build disk. This is to allow the new RSCSAUTH code to be executed for testing.

5 Start the RSCSAUTH server machine using the new code.

rscsauth

```
   ⋮
DMTATH2042I Authorized_user is the fully authorized user
DMTATH2046I A is the file mode used to maintain the RSCSAUTH configuration files
DMTATH3090I Trace is defined as OFF
DMTATH4015I All SPOOL / RDR files will be transferred to the :RSCS server
for processing
DMTATH3080I Critical messages will be sent to tell_user_id
DMTATH3095I RSCS commands will be handled by the rscs_id server
DMTATH4000I Logging is enabled. Messages will be recorded in NEWKEEP. A maximum
of 8 log files will be maintained
DMTATH2997I RSCSCMDS CONFIG A is not available to the RSCSAUTH server
DMTATH3020I RSCSAUTH Server Function Level 720-0000 is running
DMTATH3036I QUERY SYSTEM LOCAL requested by RSCSAUTH Server
   ⋮
```

6 Disconnect the RSCSAUTH user ID.

#cp disc

7 Log on to the RSCSAUTH administration ID. This is the ID previously defined in the RSCSAUTH CONFIG file as having administration authority. The default administration ID shipped in the sample RSCSAUTH CONFIG is MAINT.

8 Create command group RSCS_QUERY with command 'QUERY'

SMSG *rscsauth_server_id* **COMMANDGROUP ADD RSCS_QUERY QUERY**

rscsauth_server_id is the user ID where RSCSAUTH is running.

An example of the system response might be:

```
DMTATH3035I COMMANDGROUP ADD RSCS_QUERY QUERY requested by MAINT AT GDLVM7
DMTATH2100I Command QUERY has been added to the Command Group Table for group
RSCS_QUERY
```

9 Authorize a third user ID for command group RSCS_QUERY.

SMSG *rscsauth_server_id* **USERAUTH ADD** *userid* **RSCS_QUERY**

rscsauth_server_id is the user ID where RSCSAUTH is running. *userid* is a third user ID where an RSCS Query command will be issued from.

An example of the system response might be:

```
DMTATH3035I USERAUTH ADD userid RSCS QUERY requested by auth_user
DMTATH2100I Command Group RSCS_QUERY has been added to the User Authorization
Table for user userid
```

10 Log on to the user ID you just authorized to issue the RSCS Query command.

11 Issue an RSCS Query command through the RSCSAUTH server.

SMSG *rscsauth_server_id* **QUERY LINKS**   *rscsauth_server_id* is the user ID where
                                                      RSCSAUTH is running.

                                                      You should received a query response from the
                                                      RSCS server.

```
02:11:12 Link                        Line
02:11:12 Name      Status     Type   Addr LU Name  Logmode  Queueing
  ⋮
```

What's Next?

Verification of RSCS is now complete.

Where to next?

If installing, proceed with 6.5, "Place RSCS into Production" on page 24 to initialize the RSCS server
machines.

OR

If servicing, continue with 7.1, "Servicing RSCS" on page 27 to **replace** the RSCS code running in
production on your system with the newly serviced code.

Appendix B. Supplied Sample Packages

This appendix has tables showing all the sample packages provided with RSCS, what each file is for, and what disk they are installed on.

B.1 Samples for Configuring RSCS and Data Interchange Manager

Data Interchange Manager uses RSCS exit points 0, 21, and 24. The following table shows sample files installed on the 7VMRSC20's 406 disk used to configure and operate RSCS and Data Interchange Manager.

Figure 12 (Page 1 of 2). RSCS Supplied Sample Files		
Sample File Name	**Disk Installed to**	**Sample Description**
ACHARSCS CONFSAMP	406	Sample RSCS configuration file for XCHANGE, use as ACHARSCS CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
RSCS CONFSAMP	406	Sample RSCS configuration file, use as RSCS CONFIG on the RSCS 401 disk.
RSCSAUTH CONFSAMP	406	Sample RSCSAUTH configuration file, use as RSCSAUTH CONFIG on the RSCS 403 disk.
XCHANGE CONFSAMP	406	Sample XCHANGE configuration file, use as XCHANGE CONFIG on the RSCS 403 disk.
PROFILE GCSSAMP	406	Sample PROFILE GCS file for the RSCS virtual machine, use as PROFILE GCS on the RSCS 401 disk.
PROFILE EXECSAMP	406	Sample PROFILE EXEC file for the XCHANGE virtual machine, use as PROFILE EXEC on the RSCS 403 disk.
RSCSAUTH EXECSAMP	406	Sample PROFILE EXEC file for the RSCSAUTH virtual machine, use as PROFILE EXEC on the RSCSAUTH 191 disk.
ACHAFAIL TEMPSAMP	406	Sample XCHANGE failure template, use as ACHAFAIL TEMPLATE on the RSCS 403 disk.
NOTHERE TEMPSAMP	406	Sample RSCS unknown user ID template, use as NOTHERE TEMPLATE on the RSCS 401 disk.
UNKNOWN TEMPSAMP	406	Sample RSCS unknown node ID template, use as UNKNOWN TEMPLATE on the RSCS 401 disk.
RSCSTAB ASSEMBLE	406	Sample VTAM MODE tables for the RSCS virtual machine.
RSCSTAB TEXT	406	Assembled version.
RSCSTAB LKEDCTRL	406	Used to build LOADLIB for use by VTAM.
RSCSNET VTAMLST	406	Sample VTAM definitions for the RSCS application.
LKEDCHK EXEC	406	Exec to check a LKEDIT file for any error messages.
DMTVMEX CNTRL	406	Control file for the sample exits.
PPS EXEC	406	This exec is intended to be used to send postscript files to RSCS links using either the LPR driver with the LPRXPSE exit module or the TCPASCII or ASCII drivers using the ASCXPSE exit module.

Figure 12 (Page 2 of 2). RSCS Supplied Sample Files		
Sample File Name	Disk Installed to	Sample Description
PPS XEDIT	406	This XEDIT macro is intended to be used to send postscript files from within the XEDIT environment to RSCS links using either the LPR driver with the LPRXPSE exit module or the TCPASCII or ASCII drivers using the ASCXPSE exit module.

B.2 Planning and Install Configuration Files

The following table shows sample configuration files installed on the 7VMRSC20's 406 disk which match the configuration examples in Appendix B of the *z/VM: RSCS Networking Planning and Configuration* book.

Figure 13. RSCS Supplied Sample Files		
Sample File Name	Disk Installed to	Sample Description
ITRACE CONFSAMP	406	Sample ITRACE entries, use as ITRACE CONFIG on the RSCS 401 disk.
EXITS CONFSAMP	406	Sample EXIT entries, use as EXITS CONFIG on the RSCS 401 disk.
AUTHS CONFSAMP	406	Sample AUTH statement entries, use as AUTHS CONFIG on the RSCS 401 disk.
TRAILER CONFSAMP	406	Statements to be placed after link and node specifications, use as TRAILER CONFIG on the RSCS 401 disk.
ROUTES CONFSAMP	406	Sample ROUTE statements, use as ROUTES CONFIG on the RSCS 401 disk.
DEST CONFSAMP	406	Sample DEST statements, use as DEST CONFIG on the RSCS 401 disk.
RSCSSMPL CONFSAMP	406	Sample MASTER configuration file which contains IMBEDs for the other configuration files in this table, among other things. Use as RSCS CONFIG on the RSCS 401 disk.
PRINTERS CONFSAMP	406	Sample LINKDEFINE and PARMS for printers links, use as PRINTERS CONFIG on the RSCS 401 disk.
NETLINKS CONFSAMP	406	Sample LINKDEFINE and PARMS for networking links, use as NETLINKS CONFIG on the RSCS 401 disk.
FRONT CONFSAMP	406	Statements to be placed before link definitions, use as FRONT CONFIG on the RSCS 401 disk.

B.3 Command Response Interface (CRI) Package

The following table shows the files included with the RSCS CRI package.

Figure 14. CRI Package		
Sample File Name	**Disk Installed to**	**Sample Description**
CRIPARSE EXEC	406	This exec can be imbedded in another exec to separate the fields in a single line of an RSCS CRI response.
CRITEST EXEC	406	This exec allows you to issue a command to an RSCS system, trap the response and then write it out to the terminal.
CRITRAP EXEC	406	This exec can be imbedded in another exec to trap synchronous responses to queries and other synchronous RSCS commands.

B.4 Gateway Program Interface Link Driver (GPSAMP) Package

The following table shows the files included with the GPSAMP Link Driver package.

Figure 15. GPSAMP Package		
Sample File Name	**Disk Installed to**	**Sample Description.**
GPSAMP OVERVIEW	406	Description of the sample gateway program interface package.
GPSAMP ASSEMBLE	2B3	Mainline routine of sample gateway program.
GPSAMP TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GPSBLK ASSEMBLE	2B3	IUCV communications utilities for use with the GPSAMP package.
GPSBLK TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GPSREC ASSEMBLE	2B3	NJE Gateway interface to Gateway Sample Record Interface.
GPSREC TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GPSMSG MSGS	2B3	Message repository for sample GPSAMP package.
GPSMSG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
GPSMGC MCONV	2B3	Message conversion repository for sample GPSAMP package.
GPSMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
GPIUCV MACRO	2B2	Macro for use with GPSAMP package, built into DMTMACEX MACLIB.
GPLISTB MACRO	2B2	Macro for use with GPSAMP package, built into DMTMACEX MACLIB.
GPLISTR MACRO	2B2	Macro for use with GPSAMP package, built into DMTMACEX MACLIB.

B.5 Gateway Security Modifications (GSM) Exit Package

The GSM package uses RSCS exit points 0, 1, 14, 15, 19, 21, 29, and 32. The following table shows the files included with the GSM exit package.

Figure 16 (Page 1 of 2). GSM Package		
Sample File Name	**Disk Installed to**	**Sample Description**
GSM31 SCRIPT	406	Description of the Gateway Security Modifications exit package.
GSM CONFSAMP	406	Sample RSCS configuration file, use as GSM CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
CONFIG EXEC	406	This exec converts a security direct file into a security configuration file. Output should go to the RSCS 401 disk.
TSORT MODULE	406	Used by the CONFIG EXEC.
SECURITY SAMPDIR	406	Use as SECURITY DIRECT on the 7VMRSC20 406 disk. This file is input to the CONFIG EXEC which creates the SECURITY CONFIG file.
GSMCOM ASSEMBLE	2B3	Common task services subroutines for GSM package.
GSMCOM TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSMQSA ASSEMBLE	2B3	Queue-based storage allocation for GSM package.
GSMQSA TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSMSEC ASSEMBLE	2B3	Security checking interface routines for GSM package.
GSMSEC TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM000 ASSEMBLE	2B3	GSM initialization routine for GSM package.
GSM000 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM001 ASSEMBLE	2B3	User exit 1 for GSM package.
GSM001 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM014 ASSEMBLE	2B3	SYSIN files security checker for GSM package.
GSM014 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM015 ASSEMBLE	2B3	SYSOUT files security checker for GSM package.
GSM015 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM019 ASSEMBLE	2B3	Command security checker for GSM package.
GSM019 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM021 ASSEMBLE	2B3	Local files security checker for GSM package.
GSM021 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM029 ASSEMBLE	2B3	Command executor and syntax catcher for GSM package.
GSM029 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSM032 ASSEMBLE	2B3	Remote command and message security checker for GSM package.
GSM032 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
GSMMSG MSGS	2B3	Message repository for GSM package.
GSMMSG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
GSMMGC MCONV	2B3	Message conversion repository for GSM package.
GSMMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
EXITWA MACRO	2B2	Macro for use with GSM package, built into DMTMACEX MACLIB.
ACCNTGSM MACRO	2B2	Macro for use with GSM package, built into DMTMACEX MACLIB.

Figure 16 (Page 2 of 2). GSM Package		
Sample File Name	**Disk Installed to**	**Sample Description**
GSMCVT MACRO	2B2	Macro for use with GSM package, built into DMTMACEX MACLIB.
SECRMAP MACRO	2B2	Macro for use with GSM package, built into DMTMACEX MACLIB.
SECENT MACRO	2B2	Macro for use with GSM package, built into DMTMACEX MACLIB.
SECWA MACRO	2B2	Macro for use with GSM package, built into DMTMACEX MACLIB.

B.6 Spool Manager Command Echoing (SAC) Exit Package

The SAC package uses RSCS exit points 24, 25, and 29. The following table shows the files included with the SAC exit package.

Figure 17. SAC Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SAC OVERVIEW	406	Description of the spool manager command echoing exit package.
SAC CONFSAMP	406	Sample RSCS configuration file, use as SAC CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SACPCM ASSEMBLE	2B3	Diagnostic routines for SAC package.
SACPCM TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SACENG MSGS	2B3	Message repository for SAC package.
SACENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SACMGC MCONV	2B3	Message conversion repository for SAC package.
SACMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.7 Simple Accounting (SAS) Exit Package

The SAS package uses RSCS exit points 2, 3, 4, and 5. The following table shows the files included with the SAS exit package.

Figure 18 (Page 1 of 2). SAS Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SAS OVERVIEW	406	Description of the simple accounting exit package.
SAS CONFSAMP	406	Sample RSCS configuration file, use as SAS CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SASPOL ASSEMBLE	2B3	Write accounting records to message link for SAS package.

Figure 18 (Page 2 of 2). SAS Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SASPOL TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.

B.8 Back-To-Back (SBK) Exit Package

The SBK package uses RSCS exit points 0, 21, and 24. The following table shows the files included with the SBK exit package.

Figure 19. SBK Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SBK OVERVIEW	406	Description of the the back-to-back exit package.
SBK CONFSAMP	406	Sample RSCS configuration file, use as SBK CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SBKBAK ASSEMBLE	2B3	Implements a general back-to-back RSCS configuration for SBK package.
SBKBAK TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SBKENG MSGS	2B3	Message repository for SBK package.
SBKENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SBKMGC MCONV	2B3	Message conversion repository for SBK package.
SBKMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.9 Secondary RSCS List Processor Bursting Machine (SBURST) Exit Package

The SBURST package uses RSCS exit points 0, 1, 19, 21, and 24. The following table shows the files included with the SBURST exit package.

Figure 20 (Page 1 of 2). SBURST Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SBURST OVERVIEW	406	Description of the secondary RSCS list processor bursting machine exit package.
SBURST CONFSAMP	406	Sample RSCS configuration file, use as SBURST CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SBURST ASSEMBLE	2B3	Generates TBURSTER control block or mapping DSECT for SBURST package.
SBURST TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SBUENG MSGS	2B3	Message repository for SBURST package.

Figure 20 (Page 2 of 2). SBURST Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SBUENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SBUMGC MCONV	2B3	Message conversion repository for SBURST package.
SBUMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.10 Selective File Filter (SFF) Exit Package

The SFF package uses RSCS exit points 0, 1, 15, 21, and 29. The following table shows the files included with the SFF exit package.

Figure 21 (Page 1 of 2). SFF Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SFF OVERVIEW	406	Description of the selective file filter exit package.
SFF CONFSAMP	406	Sample configuration file for the SFF exit, use as SFF CONFIG on the RSCS 401 disk.
SFFCONF CONFSAMP	406	Sample RSCS configuration file, use as SFFCONF CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SFFPROT ASSEMBLE	2B3	Initialization prototype image module for SFF package.
SFFPROT TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SFF000 ASSEMBLE	2B3	Initialization processing exit for SFF package.
SFF000 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SFF001 ASSEMBLE	2B3	Terminate exit for SFF package.
SFF001 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SFF015 ASSEMBLE	2B3	Table lookup exit for SFF package.
SFF015 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SFF021 ASSEMBLE	2B3	Table lookup exit for SFF package.
SFF021 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SFF029 ASSEMBLE	2B3	Command processing exits for SFF package.
SFF029 TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SFFMSG MSGS	2B3	Message repository for SFF package.
SFFMSG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SFFMGC MCONV	2B3	Message conversion repository for SFF package.
SFFMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SFFCAL MACRO	2B2	Macro for use with SFF package, built into DMTMACEX MACLIB.
SFFENT MACRO	2B2	Macro for use with SFF package, built into DMTMACEX MACLIB.

Figure 21 (Page 2 of 2). SFF Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SFFHDR MACRO	2B2	Macro for use with SFF package, built into DMTMACEX MACLIB.
SFFMSG MACRO	2B2	Macro for use with SFF package, built into DMTMACEX MACLIB.
SFFPUR MACRO	2B2	Macro for use with SFF package, built into DMTMACEX MACLIB.

B.11 Shift-Based File Limiting (SFL) Exit Package

The SFL package uses RSCS exit points 0, 1, 31, and 33. The following table shows the files included with the SFL exit package.

Figure 22. SFL Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SFL OVERVIEW	406	Description of the shift-based file limiting exit package.
SFL CONFSAMP	406	Sample RSCS configuration file, use as SFL CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SFLIMT ASSEMBLE	2B3	File limiting on shift basis for SFL package.
SFLIMT TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SFLENG MSGS	2B3	Message repository for SFL package.
SFLENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SFLMGC MCONV	2B3	Message conversion repository for SFL package.
SFLMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.12 Console Logging/Screening (SMG) Exit Package

The SMG package uses RSCS exit points 0, and 27. The following table shows the files included with the SMG exit package.

Figure 23. SMG Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SMG OVERVIEW	406	Description of the console logging/screening exit package.
SMG CONFSAMP	406	Sample RSCS configuration file, use as SMG CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SMGMON ASSEMBLE	2B3	Initialization exit to define logging link and start it for SMG package.
SMGMON TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.

B.13 Messager Link Driver (SMS) Exit Package

The following table shows the files included with the SMS exit package.

Figure 24. SMS Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SMS OVERVIEW	406	Description of the messager link driver exit package.
SMS CONFSAMP	406	Sample RSCS configuration file, use as SMS CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SMSDRV ASSEMBLE	2B3	Messager line driver main entry point for SMS package.
SMSDRV TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SMSENG MSGS	2B3	Message repository for SMS package.
SMSENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SMSMGC MCONV	2B3	Message conversion repository for SMS package.
SMSMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.14 Note Selection/Modification (SNM) Exit Package

The SNM package uses RSCS exit points 22, and 23. The following table shows the files included with the SNM exit package.

Figure 25. SNM Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SNM OVERVIEW	406	Description of the note selection / modification exit package.
SNM CONFSAMP	406	Sample RSCS configuration file, use as SNM CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SNMODI ASSEMBLE	2B3	Main entry point for SNM package.
SNMODI TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.

B.15 Notify Driver Purge (SNS) Exit Package

The SNS package uses RSCS exit point 36. The following table shows the files included with the SNS exit package.

Figure 26. SNS Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SNS OVERVIEW	406	Description of the notify driver purge exit package.
SNS CONFSAMP	406	Sample RSCS configuration file, use as SNS CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SNSAVE ASSEMBLE	2B3	Main entry point for SNS package.
SNSAVE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.

B.16 Pathalias Map Processing and PAPATH Command (SPA) Exit Package

The SPA package uses RSCS exit points 0, and 29. The following table shows the files included with the SPA exit package.

Figure 27. SPA Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SPA OVERVIEW	406	Description of the pathalias map processing and PAPATH command exit package.
SPA CONFSAMP	406	Sample RSCS configuration file, use as SPA CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SPATHA ASSEMBLE	2B3	PAthalias maps treated as RSCS ROUTE table for SPA package.
SPATHA TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SPAENG MSGS	2B3	Message repository for SPA package.
SPAENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SPAMGC MCONV	2B3	Message conversion repository for SPA package.
SPAMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.17 File Queue Aging (SQA) Exit Package

The SQA package uses RSCS exit points 0, 1, 3, 26, 31, 33, and 34. The following table shows the files included with the SQA exit package.

Figure 28 (Page 1 of 2). SQA Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SQA OVERVIEW	406	Description of the file queue aging exit package.

Figure 28 (Page 2 of 2). SQA Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SQA CONFSAMP	406	Sample RSCS configuration file, use as SQA CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SQA PARMSAMP	406	A sample queue aging parms file, read at RSCS initialization time. Use as SQA PARMS on the 7VMRSC20 406 disk.
SQACSC EXEC	406	Takes a sample tabulated functions file (SQAXMP TABLE) for a descent curve named AGEFUNC and an ascent curve named FILEFUNC and creates the cubic spline coefficients (SQAXMP) ASSEMBLE file.
SQAXMP SAMPTABL	406	Is a sample tabulated functions file for a descent curve named AGEFUNC and an ascent curve named FILEFUNC. Use as SQAXMP TABLE on the RSCS 401 disk.
SQAFQA ASSEMBLE	2B3	Main entry point for SQA package.
SQAFQA TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SQAXMP ASSEMBLE	2B3	Created by running the SQACSC EXEC.
SQAXMP TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SQAENG MSGS	2B3	Message repository for SQA package.
SQAENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SQAMGC MCONV	2B3	Message conversion repository for SQA package.
SQAMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.18 REMOVE Command (SRMVEX) Exit Package

The SRMVEX package uses RSCS exit points 21, and 29. The following table shows the files included with the SRMVEX exit package.

Figure 29. SRMVEX Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SRMVEX OVERVIEW	406	Description of the REMOVE Command exit package.
SRMVEX CONFSAMP	406	Sample RSCS configuration file, use as SRMVEX CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SRMVEX ASSEMBLE	2B3	Selective transfer of file to a parking user ID for SRMVEX package.
SRMVEX TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SRMENG MSGS	2B3	Message repository for SRMVEX package.
SRMENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SRMMGC MCONV	2B3	Message conversion repository for SRMVEX package.
SRMMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.19 SHOW and PATH Command (SSH) Exit Package

The SSH package uses RSCS exit point 29. The following table shows the files included with the SSH exit package.

Figure 30. SSH Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SSH OVERVIEW	406	Description of the SHOW and PATH command exit package.
SSH CONFSAMP	406	Sample RSCS configuration file, use as SSH CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SSHPTH ASSEMBLE	2B3	Command processor for SHOW and PATH commands for SSH package.
SSHPTH TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SSHENG MSGS	2B3	Message repository for SSH package.
SSHENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SSHMGC MCONV	2B3	Message conversion repository for SSH package.
SSHMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.20 GMT Offset Correction for RSCS Package

This package uses RSCS exit point 0. The following table shows the files included with the set GMT offset exit package.

Figure 31. SSI Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SSI OVERVIEW	406	Description of the set GMT offset for single system image systems exit package.
SSI CONFSAMP	406	Sample RSCS configuration file, use as SSI CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SSIGMT ASSEMBLE	2B3	GMT offset correction for SSI package.
SSIGMT TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SSIENG MSGS	2B3	Message repository for SSI package.
SSIENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SSIMGC MCONV	2B3	Message conversion repository for SSI package.
SSIMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.21 Separator Page (SSP) Exit Package

The SSP package uses RSCS exit points 17, and 18. The following table shows the files included with the SSP exit package.

Figure 32. SSP Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SSP OVERVIEW	406	Description of the separator page exit package.
SSP CONFSAMP	406	Sample RSCS configuration file, use as SSP CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SSPAGE ASSEMBLE	2B3	Generate separator pages for SSP package.
SSPAGE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.

B.22 Simple Security (SSS) Exit Package

The SSS package uses RSCS exit points 0, 1, 14, 15, 19, 21 and 32. The following table shows the files included with the SSS exit package.

Figure 33. SSS Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SSS OVERVIEW	406	Description of the simple security exit package.
SECURE CONFSAMP	406	Sample configuration file for the SSS exit, use as SECURE CONFIG on the RSCS 401 disk.
SSS CONFSAMP	406	Sample RSCS configuration file, use as SSS CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SSSECU ASSEMBLE	2B3	Handles all necessary virtual printer functions for SSS package.
SSSECU TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SSSENG MSGS	2B3	Message repository for SSS package.
SSSENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SSSMGC MCONV	2B3	Message conversion repository for SSS package.
SSSMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.23 Statistics-Gathering (SST) Exit Package

The SST package uses RSCS exit points 0, 3, and 21. The following table shows the files included with the SST exit package.

Figure 34 (Page 1 of 2). SST Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SST OVERVIEW	406	Description of the statistics-gathering exit package.

Figure 34 (Page 2 of 2). SST Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SST CONFSAMP	406	Sample RSCS configuration file, use as SST CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SSTATS ASSEMBLE	2B3	Gather statistics for SST package.
SSTATS TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SSTENG MSGS	2B3	Message repository for SST package.
SSTENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SSTMGC MCONV	2B3	Message conversion repository for SST package.
SSTMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.24 Host Transfer Agent Link Driver (STR) Exit Package

The following table shows the files included with the STR exit package.

Figure 35. STR Package		
Sample File Name	**Disk Installed to**	**Sample Description**
STR OVERVIEW	406	Description of the host transfer agent link driver exit package.
STR CONFSAMP	406	Sample RSCS configuration file, use as STR CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
STRDRV ASSEMBLE	2B3	Host transfer agent (sample transfer) for STR package.
STRDRV TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
STRENG MSGS	2B3	Message repository for STR package.
STRENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
STRMGC MCONV	2B3	Message conversion repository for STR package.
STRMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.25 Sample TYPE Command (STY) Exit Package

The STY package uses RSCS exit point 29. The following table shows the files included with the STY command exit package.

Figure 36 (Page 1 of 2). STY Package		
Sample File Name	**Disk Installed to**	**Sample Description**
STY OVERVIEW	406	Description of the sample TYPE command exit package.

Figure 36 (Page 2 of 2). STY Package		
Sample File Name	**Disk Installed to**	**Sample Description**
STY CONFSAMP	406	Sample RSCS configuration file, use as STY CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
STYPCM ASSEMBLE	2B3	Simulate the CMS TYPE command for STY package.
STYPCM TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
STYENG MSGS	2B3	Message repository for STY package.
STYENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
STYMGC MCONV	2B3	Message conversion repository for STY package.
STYMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.26 Virtual Printer Link Driver (SVP) Exit Package

The following table shows the files included with the SVP exit package.

Figure 37. SVP Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SVP OVERVIEW	406	Description of the virtual printer link driver exit package.
SVP CONFSAMP	406	Sample RSCS configuration file, use as SVP CONFIG on the RSCS 401 disk imbedded in RSCS CONFIG.
SVPDRV ASSEMBLE	2B3	Virtual printer driver for SVP package.
SVPDRV TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB.
SVPENG MSGS	2B3	Message repository for SVP package.
SVPENG TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.
SVPMGC MCONV	2B3	Message conversion repository for SVP package.
SVPMGC TEXT	2B2	Compiled version, built into RSCSEXIT LOADLIB.

B.27 SENDLIST Package

The following table shows the files included with the SENDLIST package, which can be used to send files or notes using the RSCS list processor facility.

Figure 38 (Page 1 of 2). SENDLIST Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SENDLIST PACKAGE	406	List of files included with package.

Figure 38 (Page 2 of 2). SENDLIST Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SENDLIST EXEC	406	Exec used to send files or notes via an RSCS list processor for SENDLIST package.
SENDLIST HELPCMS	29D	Online documentation for package.
X$SNDL$X XEDIT	406	Macro to display file selection screen for SENDLIST package.

B.28 SPOOLAID Package

The following table shows the files included with the SPOOLAID package, which can be used to browse spool file internals.

Figure 39. SPOOLAID Package		
Sample File Name	**Disk Installed to**	**Sample Description**
SPOOLAID PACKAGE	406	List of files included with package.
SPOOLAID ANNOUNCE	406	Introduction and description of package.
SA EXEC	406	Exec used to invoke SPOOLAID.
SAELOG EXEC	406	Error logging exec for SPOOLAID package.
SA HELPCMS	29D	Online documentation for the SA command.
SASFB HELPSA	29D	Online documentation for the SFBLOK display.
SASPLINK HELPSA	29D	Online documentation for the SPLINK display.
SAXAB HELPSA	29D	Online documentation for the XAB display.
SADUMPER ASSEMBLE	2B3	Base source file for doing viewing spool file internals.
DUMPSUB ASSEMBLE	2B3	Internal subroutine called by SADUMPER.
SADUMPER MODULE	406	Usable version of assemble files.
SPOOLAID SAMPPROF	406	Sample SPOOLAID PROFILE for altering defaults, use as SPOOLAID PROFILE on the 7VMRSC20 406 disk.
SACMDS XEDIT	406	Screen manager maro for SPOOLAID package.

B.29 ASCII Printer and Plotter (ASCII) Exit Package

The following table shows the files included with the ASCII exit package.

Note: The exit entry name (used on the EXIT=name** parameter when defining an ASCII type link) is not the same as the exit package name. See the highlighted entry name.**

Figure 40. ASCII Package		
Sample File Name	**Disk Installed to**	**Sample Description**
ASCXDSOE ASSEMBLE	2B3	Support of the Datasouth DS180 matrix printer for ASCII package.
ASCXDSOE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name DSOE.**
ASCXDWRE ASSEMBLE	2B3	Support of the the LA120 Decwriter printer for ASCII package.
ASCXDWRE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name DWRE.**
ASCXPROP ASSEMBLE	2B3	Support of the IBM PROprinter for ASCII package.
ASCXPROP TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name PROP.**
ASCXSPWE ASSEMBLE	2B3	Support of the NEC 3515 Spinwriter printer for ASCII package.
ASCXSPWE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name SPWE.**
ASCXZZET ASSEMBLE	2B3	Support of the Nicolet ZETA 3653SX drum plotter for ASCII package.
ASCXZZET TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name ZZET.**
ASCX749E ASSEMBLE	2B3	Support of the IBM instruments XY/749 multipen digital plotter for ASCII package.
ASCX749E TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name 749E.**
ASCXONE ASSEMBLE	2B6	Support of a reentrant exit module supporting non-postscript printers only.
ASCXONE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name ASCXONE.**
ASCXPSE ASSEMBLE	2B3	Support of a reentrant exit module supporting a postscript only printer for ASCII package.
ASCXPSE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB **with entry name ASCXPSE.**

B.30 LPR Exit Package

The following table shows the files included with the LPR Printer driver exit package.

Figure 41. LPR Package		
Sample File Name	**Disk Installed to**	**Sample Description**
LPRXONE ASSEMBLE	2B3	Support of a reentrant LPR exit module supporting non-postscript printers only.
LPRXONE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB with entry name LPRXONE.
LPRXPSE ASSEMBLE	2B3	Support of a reentrant LPR exit module supporting postscript only printers.
LPRXPSE TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB with entry name LPRXPSE.
LPRXFORM ASSEMBLE	2B6	Support of a reentrant exit module which contains exit 0 and exit 1 entry points to build form block tables for use with LPR-type links. These tables supply overrides, selected with the form name the file was spooled with, to LPR-type defined links.
LPRXFORM TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB with entry names LPRXFM00 and LPRXFM01.

B.31 LPD Exit Package

The following table shows the files included with the LPD link driver exit package.

Figure 42. LPD Package		
Sample File Name	**Disk Installed to**	**Sample Description**
LPDXMANY ASSEMBLE	2B6	Supports a single LPD printer queue. Multiple LPD link drivers can be defined and started using this exit module.
LPDXMANY TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB with entry name LPDXMANY.

B.32 UFT Exit Package

The following table shows the files included with the UFT support exit package.

Figure 43. UFT Support Exit Package		
Sample File Name	**Disk Installed to**	**Sample Description**
UFTXOUT ASSEMBLE	2B6	Support of a reentrant UFT exit module to support transmitting one file to a remote UFT daemon at a time.
UFTXOUT TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB with entry name UFTXOUT.
UFTXIN ASSEMBLE	2B6	Support of a reentrant UFTD exit module to support a single RSCS UFT daemon. Multiple UFTD link drivers can be defined and started using this exit module.
UFTXIN TEXT	2B2	Assembled version, built into RSCSEXIT LOADLIB with entry name UFTXIN.

Appendix C. Moving RSCS to SFS Directories and Creating a PPF Override

By default, RSCS Networking for z/VM is installed to minidisks as part of the z/VM System deliverable unless you choose to install RSCS to SFS during the initial z/VM installation. If you did not install RSCS into SFS directories and want to move it now, you can. Refer to Figure 8 on page 12 to see which minidisks can reside in SFS. IBM recommends that you use the default file pool, VMPSFS, but you can use a file pool of your choosing. If you are running in an SSI cluster then this new file pool needs to be accessible to all members. This can be accomplished by specifying the SSI startup parameter in the file pool server DMSPARMS file.

A summary of the steps that are needed to place RSCS into SFS are:

- Allocate space in the user-defined or default file pool

- Provide the user IDs 7VMRSC20 and MAINT720 with access to the user-defined file pool

- Create the necessary RSCS subdirectories

- Copy files from the minidisks to the new SFS subdirectories

- Create a PPF override, if not using the default file pool or subdirectory names.

Where to next

You need to do one of the following:

- If you want to place RSCS into SFS directories **using the defaults defined in the 7VMRSC20 PPF file** and you are running in a non-SSI or a single member SSI environment, you can use the **MOVE2SFS** command, as documented in the *z/VM: CP Commands and Utilities Reference* manual.

- If you want to place RSCS into your **own user-defined file pool or SFS directories** or want to use the default SFS directories and you are running in a multiple member SSI environment, continue with the instructions in C.1, "Setup SFS File Pool and Directories" on page 67.

- If you **only need to create a PPF override**, continue with the instructions in C.3, "Create Product Parameter File (PPF) Override" on page 70.

If you were pointed to this appendix from another section and you have completed the steps required (whether provided in this appendix or in the *z/VM: CP Commands and Utilities Reference*), you should now return to your original section to continue.

C.1 Setup SFS File Pool and Directories

Notes:

1. The steps that follow help you determine the RSCS file pool space requirements, file pool enrollment, and SFS directory definitions. If not all of these steps are required - for example, if you are changing only SFS directory or subdirectory names - adapt these instructions as needed for your environment.

2. The steps that follow assume that a user-defined SFS file pool name is being used. If you will be using the VM default file pool name, VMPSFS, substitute it appropriately in any place you see the text 'user-defined file pool' or variable *userfilepool*.

3. For more information about planning for, generating and managing a file pool and server, see *z/VM: CMS File Pool Planning, Administration and Operation*.

1 Determine the number of 4k blocks that are required for the SFS directories, for each user ID, by adding up the 4K blocks required for each SFS directory you plan to use.

If you intend to use all of the default RSCS SFS directories, the 4K block requirements for each directory are summarized in Figure 8 on page 12.

This information will be used when the RSCS server machine user IDs are enrolled in the user-defined file pool.

2 Enroll RSCS server machines in the user-defined file pool using the ENROLL USER command:

```
ENROLL USER 7VMRSC20 userfilepool: (BLOCKS blocks
ENROLL USER XCHANGE userfilepool: (BLOCKS blocks
ENROLL USER RSCSAUTH userfilepool: (BLOCKS blocks
ENROLL USER RSCSDNS userfilepool: (BLOCKS blocks
```

where *blocks* is the number of 4k blocks that you calculated in the previous step.

Note: This must be done from a user ID that is an administrator for the user-defined file pool.

3 Make the system service maintenance user ID, MAINT720, a file pool administrator for the user-defined file pool so that it can update files on the RSCS service directories by adding the MAINT720 user ID to the ADMIN startup parameter in the user-defined file pool DMSPARMS file.

4 Determine if there are enough blocks available in the file pool to install RSCS. This information can be obtained from the QUERY FILEPOOL STORGRP command. The output from this command is a list of storage groups and the number of 4K blocks free. If the number of blocks free is smaller than the total 4K blocks needed (refer to Figure 8 on page 12 to obtain total blocks

needed) to install RSCS you need to add space to the file pool. See *z/VM: CMS File Pool Planning, Administration, and Operation* manual for information on adding space to a file pool.

5 Create the necessary subdirectories using the CREATE DIRECTORY command.

Note: All of the RSCS subdirectories are shown in the create directory commands. If you are not planning to create all of them, then just enter the commands for the ones you are planning to create.

A complete list of default RSCS SFS directories is provided in Figure 8 on page 12.

If you have changed any of the default SFS directory names then use your new name in place of the old name in the create directory command.

set filepool *userfilepool***:**
create directory *userfilepool***:7VMRSC20.RSCS**
create directory *userfilepool***:7VMRSC20.RSCS.object**
create directory *userfilepool***:7VMRSC20.RSCS.source**
create directory *userfilepool***:7VMRSC20.RSCS.localsam**
create directory *userfilepool***:7VMRSC20.RSCS.delta**
create directory *userfilepool***:7VMRSC20.RSCS.applyalt**
create directory *userfilepool***:7VMRSC20.RSCS.applyprod**
create directory *userfilepool***:7VMRSC20.RSCS.help**
create directory *userfilepool***:7VMRSC20.RSCS.uhelp**
create directory *userfilepool***:7VMRSC20.RSCS.xchtest**
create directory *userfilepool***:7VMRSC20.RSCS.package**
create directory *userfilepool***:XCHANGE.log**

> If necessary, see the *z/VM: CMS Commands and Utilities Reference* manual for more information about the CREATE DIRECTORY command.

6 Give the 7VMRSC20 and RSCS server machines authority to the directories they need to be able to access.

grant auth *userfilepool***:7VMRSC20.RSCS.xchtest to RSCSAUTH (read neread**
grant auth *userfilepool***:7VMRSC20.RSCS.xchtest to RSCSDNS (read newread**
grant auth *userfilepool***:7VMRSC20.RSCS.xchtest to XCHANGE (read newread**
grant auth *userfilepool***:7VMRSC20.XCHANGE. to 7VMRSC20 (write newwrite**
grant auth *userfilepool***:7VMRSC20.XCHANGE.log to 7VMRSC20 (write newwrite**

> If necessary, see the *z/VM: CMS Commands and Utilities Reference* manual for more information about the GRANT AUTHORITY command.

7 If you intend to use an SFS directory as the work space for the 7VMRSC20
user ID, update the IPL control statement in the 7VMRSC20 CP user
directory entry to look like:

```
IPL CMS PARM FILEPOOL userfilepool
```

If you intend to use an SFS directory as the work space for the XCHANGE
user ID, update the IPL control statement in the XCHANGE CP user directory
entry to look like:

```
IPL CMS PARM AUTOLOG FILEPOOL userfilepool
```

This will cause CMS to automatically access 7VMRSC20's and XCHANGE's
top directory as file mode A. Refer to the *z/VM:CP Planning and
Administration* for information on updating the CP user directory.

8 If you intend to use an SFS directory to contain log files for the RSCS Data
Interchange server, then update the XCHANGE PROFILE exec. Change the
following to the new SFS directory name:

```
ACCESS VMSYS:XCHANGE.LOG.
```

C.2 Copy Minidisk (or SFS) Files to SFS Directories

1 Copy the files from the RSCS minidisks (or from the VMSYS file pool if RSCS
is already installed there) to your new user-defined SFS file pool and
directories using the VMFCOPY command.

Note: Repeat the ACCESS and VMFCOPY commands, that follow, for each
disk or SFS directory you need to copy. Refer to Figure 8 on page 12 for
the default minidisk and SFS directory names for RSCS.

access *vdev* **e**
access *dirid* **f**
vmfcopy * * e = = f (prodid 7VMRSC20%RSCS olddate

Where

- *vdev* is the minidisk you are copying files from. If you are copying from SFS then substitute the default SFS directory name in place of *vdev*.

- *dirid* is the name of the (target) SFS directory that you are copying files to.

- 7VMRSC20%RSCS is the PRODID defined within the 7VMRSC20 PPF file for the minidisk and SFS RSCS components.

The VMFCOPY command will update the VMSES PARTCAT file on the target directory.

C.3 Create Product Parameter File (PPF) Override

This section provides information to help you create a product parameter file (PPF) override. The example used in this section is how to change the shared file system (SFS) file pool where RSCS files reside. Refer to the *VMSES/E Introduction and Reference* for more information on PPF overrides.

Note: Do **not** modify the product supplied 7VMRSC20 $PPF, 7VMRSC20 PPF, SERVP2P $PPF or SERVP2P PPF files to change the VMPSFS file pool name or any other installation parameters. If the $PPF is serviced, the existing $PPF file will be replaced, and any changes to that file will be lost. By creating your own $PPF override, your updates will be preserved.

The following process describes changing the default file pool name, "VMPSFS" to "MYPOOL1":

1 Create a new $PPF override file or edit an existing override file for the SERVP2P $PPF file.

xedit *overname* **$PPF** *fm***2**   *overname* is any name you wish to use for your PPF override file name (such as "MYRSCS").

fm is an appropriate file mode. If you create this file yourself, specify a file mode of A.

If you modify an existing override file, specify a file mode of A or D, based on where the file currently resides (A being the file mode of a R/W 191 minidisk, or equivalent; D, that of the MAINT720 51D minidisk).

2 Create (or modify as required) the Variable Declarations (**:DCL.**) section for the RSCSSFS and RSCSSFSP2P override areas so that it resembles the **:DCL.** section as shown below.

Note: The PPF file used by SERVICE, PUT2PROD, LOCALMOD is SERVP2P PPF therefore this example shows an override to the SERVP2P $PPF file.

```
:OVERLST. RSCSSFS RSCSSFSP2P
*
* ===================================================================== *
* Override Section for Initial Installation (Using SFS Directories)   *
* ===================================================================== *
:RSCSSFS. RSCSSFS SERVP2P
:DCL. UPDATE
&INST191    DIR MYPOOL1:7VMRSC20.
&BAS1Z      DIR MYPOOL1:7VMRSC20.RSCS.OBJECT
&BAS2Z      DIR MYPOOL1:7VMRSC20.RSCS.SOURCE
&SAMPZ      DIR MYPOOL1:7VMRSC20.RSCS.LOCALSAM
&DELTZ      DIR MYPOOL1:7VMRSC20.RSCS.DELTA
&APPLX      DIR MYPOOL1:7VMRSC20.RSCS.APPLYALT
&APPLZ      DIR MYPOOL1:7VMRSC20.RSCS.APPLYPROD
&BLD3Z      DIR MYPOOL1:7VMRSC20.RSCS.XCHTEST
&BLD2Z      DIR MYPOOL1:7VMRSC20.RSCS.HELP
&BLD6Z      DIR MYPOOL1:7VMRSC20.RSCS.PACKAGE
&XCH191     DIR MYPOOL1:XCHANGE.
&XCH5BF     DIR MYPOOL1:XCHANGE.LOG
:EDCL.
:END.
* ===================================================================== *
:RSCSSFSP2P. RSCSSFSP2P  SERVP2P
:DCL. UPDATE
&INST191    DIR MYPOOL1:7VMRSC20.
&BAS1Z      DIR MYPOOL1:7VMRSC20.RSCS.OBJECT
&BAS2Z      DIR MYPOOL1:7VMRSC20.RSCS.SOURCE
&SAMPZ      DIR MYPOOL1:7VMRSC20.RSCS.LOCALSAM
&DELTZ      DIR MYPOOL1:7VMRSC20.RSCS.DELTA
&APPLX      DIR MYPOOL1:7VMRSC20.RSCS.APPLYALT
&APPLZ      DIR MYPOOL1:7VMRSC20.RSCS.APPLYPROD
&BLD3Z      DIR MYPOOL1:7VMRSC20.RSCS.XCHTEST
&BLD2Z      DIR MYPOOL1:7VMRSC20.RSCS.HELP
&BLD6Z      DIR MYPOOL1:7VMRSC20.RSCS.PACKAGE
&XCH191     DIR MYPOOL1:XCHANGE.
&XCH5BF     DIR MYPOOL1:XCHANGE.LOG
:EDCL.
:END.
*
```

This override will replace the *:DCL.* section of the RSCSSFS and RSCSSFSP2P override areas of the SERVP2P $PPF file when the $PPF is compiled in step 5 on page 72.

3 Save your $PPF override file.

file

4 If your $PPF override file was created as file mode A, copy it to the Software
Inventory minidisk (MAINT720 51D; default file mode is D) and then erase it
from the A-disk.

copyfile *overname* **$PPF a = = d (olddate**
erase *overname* **$PPF a**

5 Compile your changes to create the usable *overname* PPF file.

vmfppf *overname* *****   where *overname* is the file name of your $PPF
override file.

6 Update the VM SYSSUF Software Inventory table. Since you created a PPF
override to the SERVP2P $PPF file you need to make sure that the override
name you created is reflected in the PPF tags for RSCS in the VM SYSSUF
table. Type in the command VMFUPDAT SYSSUF. This will bring up a
panel so that you can change the PPF names stored in the VM SYSSUF file.
Locate 7VMRSC20 under the 'Prodid' column. Replace the PPF name for
INSTPPF, BLDPPF and P2PPPF for 7VMRSC20 with your new PPF override
file name. Use PF5 to process your changes.

Now that the *overname* PPF file has been created, you should specify *overname*
instead of SERVP2P or 7VMRSC20 as the PPF name to be used for any
VMSES/E commands that require a PPF name for RSCS.

Appendix D. Disabling RSCS

If you had licensed and enabled RSCS for use, and no longer are licensed for RSCS, you need to explicitly disable RSCS by following the instructions in the *MEMO TO USERS for IBM Remote Spooling Communications Subsystem (RSCS) Networking for z/VM, function level 720* section 'RSCS Disablement'.

Notices

IBM may not offer the products, services, or features discussed in this document in other countries. Consult your local IBM representative for information on the products and services currently available in your area. Any reference to an IBM product, program, or service is not intended to state or imply that only that IBM product, program, or service may be used. Any functionally equivalent product, program, or service that does not infringe any IBM intellectual property right may be used instead. However, it is the user's responsibility to evaluate and verify the operation of any non-IBM product, program, or service.

IBM may have patents or pending patent applications covering subject matter described in this document. The furnishing of this document does not give you any license to these patents. You can send license inquiries, in writing, to:

```
IBM Director of Licensing
IBM Corporation
North Castle Drive
Armonk, NY 10504-1785
U.S.A.
```

For license inquiries regarding double-byte (DBCS) information, contact the IBM Intellectual Property Department in your country or send inquiries, in writing, to:

```
Intellectual Property Licensing
Legal and Intellectual Property Law
IBM Japan Ltd.
19-21, Nihonbashi-Hakozakicho, Chuo-ku
Tokyo 103-8510, Japan
```

The following paragraph does not apply to the United Kingdom or any other country where such provisions are inconsistent with local law: INTERNATIONAL BUSINESS MACHINES CORPORATION PROVIDES THIS PUBLICATION "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF NON-INFRINGEMENT, MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. Some states do not allow disclaimer of express or implied warranties in certain transactions, therefore, this statement may not apply to you.

This information could include technical inaccuracies or typographical errors. Changes are periodically made to the information herein; these changes will be incorporated in new editions of the publication. IBM may make improvements and/or changes to the product(s) and/or the program(s) described in this publication at any time without notice.

Any references in this information to non-IBM Web sites are provided for convenience only and do not in any manner serve as an endorsement of those Web sites. The materials at those Web sites are not part of the materials for this IBM product and use of those Web sites is at your own risk.

IBM may use or distribute any of the information you supply in any way it believes appropriate without incurring any obligation to you.

Licenses of this program who wish to have information about it for the purpose of enabling: (i) the exchange of information between independently created programs and other programs (including this one) and (ii) the mutual use of the information which has been exchanged, should contact:

```
IBM Corporation
Dept G37G
1701 North Street
Endicott, NY 13760
U.S.A.
```

Such information may be available, subject to appropriate terms and conditions, including in some cases, payment of a fee.

The licensed program described in this document and all licensed material available for it are provided by IBM under terms of the IBM Customer Agreement, IBM International Program License Agreement or any equivalent agreement between us.

Any performance data contained herein was determined in a controlled environment. Therefore, the results obtained in other operating environments may vary significantly. Some measurements may have been made on development-level systems and there is no guarantee that these measurements will be the same

74

on generally available systems. Furthermore, some measurement may have been estimated through extrapolation. Actual results may vary. Users of this document should verify the applicable data for their specific environment.

Information concerning non-IBM products was obtained from the suppliers of those products, their published announcements or other publicly available sources. IBM has not tested those products and cannot confirm the accuracy of performance, compatibility or any other claims related to non-IBM products. Questions on the capabilities on non-IBM products should be addressed to the suppliers of those products.

All statements regarding IBM's future direction or intent are subject to change or withdrawal without notice, and represent goals and objectives only.

This information contains examples of data and reports used in daily business operations. To illustrate them as completely as possible, the examples include the names of individuals, companies, brands, and products. All of these names are fictitious and any similarity to the names and addresses used by an actual business enterprise is entirely coincidental.

COPYRIGHT LICENSE:

This information contains sample application programs in source language, which illustrates programming techniques on various operating platforms. You may copy, modify, and distribute these sample programs in any form without payment to IBM, for the purposes of developing, using, marketing or distributing application programs conforming to IBM application programming interfaces. These examples have not been thoroughly tested under all conditions. IBM, therefore, cannot guarantee or imply reliability, serviceability, or function of these programs. The sample programs are provided "AS IS", without warranty of any kind. IBM shall not be liable for any damages arising out of your use of the sample programs.

Privacy Policy Consideration

IBM Software products, including software as a service solutions, ("Software Offerings) may use cookies or other technologies to collect product usage information, to help improve the end user experience, to tailor interactions with the end user or for other purposes. In many cases no personally identifiable information is collected by the Software Offerings. Some of our Software Offerings can help enable you to collect personally identifiable information. If the Software Offering uses cookies to collect personally identifiable information, specific information about this offering's use of cookies is set forth below.

This Software Offering does not use cookies or other technologies to collect personally identifiable information.

If the configurations deployed for this Software Offering provide you as customer the ability to collect personally identifiable information from end users via cookies and other technologies, you should seek your own legal advice about any laws applicable to such data collection, including any requirements for notice and consent.

For more information about the use of various technologies, including cookies, for these purposes, see the IBM Online Privacy Policy at http://www.ibm.com/privacy and the IBM Online Privacy Statement at http://www.ibm.com/privacy/details, in particular the section entitled "Cookies, Web Beacons and Other Technologies , and the IBM Software Products and Software-as-a-Service Privacy Statement at http://www.ibm.com/software/info/product-privacy.

Trademarks

IBM, the IBM logo, and ibm.com are trademarks or registered trademarks of International Business Machines Corp., registered in many jurisdictions worldwide. Other product and service names might be trademarks of IBM or other companies. A current list of IBM trademarks is available on the web at IBM copyright and trademark information - United States:

www.ibm.com/legal/us/en/copytrade.shtml

Adobe, the Adobe logo, PostScript and the PostScript logo are either registered trademarks or trademarks of Adobe Systems Incorporated in the United States, and/or other countries.

Reader's Comments

IBM® RSCS Networking for z/VM, function level 720

You may use the VM Feedback page (Contact z/VM) on the z/VM Web site at:

   www.vm.ibm.com/forms/

to comment about this document, its organization, or subject matter.

Please undertand that your feedback is of importance to IBM, but IBM makes no promise to always provide a response to your feedback. When you send comments to IBM, you grant IBM a nonexclusive right to use or distribute your comments in any way it believes appropriate without incurring any obligation to you.

IBM

Printed in USA