

Workload Scheduler for z/OS  
Version 8.6

*Diagnosis Guide and Reference*





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Version 8.6

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**Note**

Before using this information and the product it supports, read the information in "Notices" on page 385.

This edition applies to version 8, release 6 of IBM Tivoli Workload Scheduler for z/OS (program number 5698-A17) and to all subsequent releases and modifications until otherwise indicated in new editions.

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## About this publication

*IBM® Tivoli® Workload Scheduler for z/OS® Diagnosis Guide and Reference* contains information you need to diagnose and correct possible problems in using IBM Tivoli Workload Scheduler for z/OS. This publication also describes the structure of an IBM Tivoli Workload Scheduler for z/OS address space and describes the major functions of the subtasks.

This publication addresses these tasks:

- Determining whether the problem was caused by IBM Tivoli Workload Scheduler for z/OS.
- If the problem is in IBM Tivoli Workload Scheduler for z/OS, developing a list of keywords that describe it. This list of keywords will be used by the IBM Support Center to search a database to determine if your problem has previously been reported.
- Isolating failing program code so that a solution can be found.

The term *scheduler*, when used in this publication, refers to Tivoli Workload Scheduler for z/OS. The term DB2®, when used in this publication, refers to DATABASE 2 and DB2 Universal Database™.

The term *z/OS* is used in this publication to mean *z/OS* and *OS/390®* operating systems. Where the term *OS/390* appears, the related information applies only to *OS/390* operating systems.

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## What is new in this publication

Except for editorial changes, changed or added text in this edition is marked in the left margin with a vertical bar.

For information about the new and changed functions in this release, see *Tivoli Workload Automation: Overview*.

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## Who should read this publication

This publication is intended for system programmers who work with IBM Tivoli Workload Scheduler for z/OS and for IBM users responsible for IBM Tivoli Workload Scheduler for z/OS service.

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## Publications

Full details of Tivoli Workload Automation publications can be found in *Tivoli Workload Automation: Publications*, . This document also contains information on the conventions used in the publications.

A glossary of terms used in the product can be found in *Tivoli Workload Automation: Glossary*, .

Both of these are in the Information Center as separate publications.

### Using LookAt to look up message explanations

LookAt is an online facility that lets you look up explanations for most of the IBM messages you encounter, as well as for some system abends (an abnormal end of a task) and codes. Using LookAt to find information is faster than a conventional search because in most cases LookAt goes directly to the message explanation.

You can use LookAt from the following locations to find IBM message explanations for z/OS elements and features, z/VM<sup>®</sup>, VSE/ESA, and Clusters for AIX<sup>®</sup> and Linux:

- The Internet. You can access IBM message explanations directly from the LookAt website at <http://www.ibm.com/eserver/zseries/zos/bkserv/lookat/>.
- Your z/OS TSO/E host system. You can install code on your z/OS or z/OS.e systems to access IBM message explanations, using LookAt from a TSO/E command line (for example, TSO/E prompt, ISPF, or z/OS UNIX System Services running OMVS).
- Your Microsoft Windows workstation. You can install code to access IBM message explanations on the *IBM Online Library z/OS Software Products Collection Kit (SK3T-4270)*, using LookAt from a Microsoft Windows DOS command line.
- Your wireless handheld device. You can use the LookAt Mobile Edition with a handheld device that has wireless access and an Internet browser (for example, Internet Explorer for Pocket PCs, Blazer, or Eudora for Palm OS, or Opera for Linux handheld devices). Link to the LookAt Mobile Edition from the LookAt website.

You can obtain code to install LookAt on your host system or Microsoft Windows workstation from a disk on your *IBM Online Library z/OS Software Products Collection Kit (SK3T-4270)*, or from the LookAt website (click **Download**, and select the platform, release, collection, and location that suit your needs). More information is available in the LOOKAT.ME files available during the download process.

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## Accessibility

Accessibility features help users with a physical disability, such as restricted mobility or limited vision, to use software products successfully. With this product, you can use assistive technologies to hear and navigate the interface. You can also use the keyboard instead of the mouse to operate all features of the graphical user interface.

For full information with respect to the Dynamic Workload Console, see the Accessibility Appendix in the *Tivoli Workload Scheduler: User's Guide and Reference*, SC32-1274.

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## Tivoli technical training

For Tivoli technical training information, refer to the following IBM Tivoli Education website:

<http://www.ibm.com/software/tivoli/education>

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## Support information

If you have a problem with your IBM software, you want to resolve it quickly. IBM provides the following ways for you to obtain the support you need:

### Online

Go to the IBM Software Support site at <http://www.ibm.com/software/support/probsub.html> and follow the instructions.

### IBM Support Assistant

The IBM Support Assistant (ISA) is a free local software serviceability workbench that helps you resolve questions and problems with IBM software products. The ISA provides quick access to support-related information and serviceability tools for problem determination. To install the ISA software, go to <http://www.ibm.com/software/support/isa>.

### Troubleshooting Guide

For more information about resolving problems, see the problem determination information for this product.

For more information about these three ways of resolving problems, see the appendix on support information in *Tivoli Workload Scheduler: Troubleshooting Guide*, SC32-1275.

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## Conventions used in this publication

This publication uses several typeface conventions for special terms and actions. Technical changes to the text are indicated by a vertical line to the left of the change. These conventions have the following meanings:

Information type	Style convention	Example
Commands	All capital letters	CREATE
References in the text to fields on panels	All capital letters	QUANTITY
Input you should type in panel fields	Monospace	MYAPPLICATION
First time new term introduced	Italics	<i>Application</i>

## Conventions used



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## Chapter 1. Introduction

This book is intended to help you classify and describe problems in Tivoli Workload Scheduler for z/OS systems.

To identify an error, you must first gather information related to the problem, such as ABEND codes and dumps. You can then determine whether the problem is in Tivoli Workload Scheduler for z/OS and, if it is, this book helps you to classify and describe the problem. The external symptoms of several problems are described to help you identify which problem type to investigate. Each problem type requires a different procedure when you describe the problem. Use these procedures to build a string of keywords and to obtain documentation relevant to the problem. This combination of a keyword string and associated documentation helps you to describe the problem accurately to IBM Software Support.

Use the Tivoli Workload Scheduler for z/OS problem description sheet on page Appendix B. Problem description sheet on page 383 as a problem log. You can copy this form and use it to record all the related facts about the problem.

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### Using keywords to describe a problem

A *keyword* is a word or abbreviation that describes a single aspect of a program failure to IBM Customer Support. You use keywords to describe all aspects of a problem, from the IBM Tivoli Workload Scheduler for z/OS component ID to the area of failure (see Chapter 2, “Initial problem analysis,” on page 9). You then use the problem analysis procedures to build a keyword string (see Chapter 3, “Problem analysis procedures,” on page 13).

For example, if your program failure is abnormal termination of a task, the keyword is ABEND. Other keywords are also formed to describe particular aspects of the abnormal termination, such as the name of the module where the abend occurred. These keywords are then combined to form a keyword string:

```
5697-WSZ01 ABENDnnn EQQyyyyy REGn
```

*where:*

<b>5698-A17</b>	The Tivoli Workload Scheduler for z/OS component ID
<b>ABEND</b>	The problem type
<i>nnn</i>	The ABEND code (for example, 0C4)
<b>EQQyyyyy</b>	The module containing the ABEND (for example, EQQMAJOR)
<b>REGn</b>	The general-purpose register containing invalid information

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### Searching the software-support database

To determine if the problem has been noted before, you can use the keyword string that you create to search the software-support database. If a problem similar to yours is described in the database, a solution is probably available. To widen or narrow the database search, you can vary the keyword string you develop.

If you have the Information/Access IBM licensed program, you can use the keyword string to search the RETAIN<sup>®</sup> database for solutions to problems similar

## Searching the software-support database

to yours. IBM Level 1 service personnel can help you develop the keyword string and search the database for a similar problem. If the RETAIN database is not available to you, the IBM Support Center will help you solve your problem.

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## What is IBM Software Support?

IBM Software Support helps you resolve problems with IBM products, and to ensure that you can make the best use of your IBM computing systems. IBM Software Support is available to all licensed users of IBM licensed programs.

The role of each member of IBM's support staff is outlined in the following sections of this chapter.

## Working with the IBM Support Center

To get assistance, you should phone your local IBM Support Center. Before you contact the IBM Support Center, however, try to ensure that the problem belongs with the Support Center. Do not worry if you cannot be sure that the problem is caused by IBM Tivoli Workload Scheduler for z/OS itself. How sure you are will depend on the complexity of your installation, the experience and skill levels of your systems staff, and the symptoms that you have been experiencing.

In practice, many errors reported to the Support Center turn out to be user errors, errors that cannot be reproduced, or errors that should be dealt with by other parts of IBM Service, such as Hardware Customer Engineering or Systems Engineering. This indicates just how difficult it can be to determine the precise cause of a problem. User errors are mainly caused by mistakes in setting up or using systems.

### Supplying information to the IBM Support Center

Your first contact with the IBM Support Center will be with the call receipt operator, who will take initial details and put your problem on a queue. You will subsequently be contacted by a Support Center representative who will investigate your problem further.

The Support Center will need to know as much as possible about your problem, so you should have the information ready before making your first call. It is a good idea to enter the information on a problem description sheet, such as the one shown on page Appendix B. Problem description sheet on page 383.

Here are two advantages of using a problem description sheet:

- You will be communicating with the IBM Support Center by telephone. With all your findings before you on a sheet of paper, you will be better prepared to respond to the questions that you might be asked.
- You can maintain your own in-house tracking system to record and document all problems. This information can then be used for planning, organizing, communicating, and establishing priorities for controlling and resolving these problems.

When you contact the Support Center, you will need to give the operator the name of your organization and your access code or customer number. Your access code or customer number is a unique code authorizing you to use IBM Software Services. You must provide this code each time you contact the Support Center. Using this information, the operator will access your customer profile, which contains your address, relevant contact names, telephone numbers, and details of the IBM products at your installation.

The Support Center operator will ask you if this is a new problem or a call on an existing one. If it is new, you will be assigned a unique incident number. A problem management record (PMR) will be opened on the RETAIN system where all activity associated with your problem will be recorded. The problem will remain *open* until it is resolved. Make a note of the incident number on your own problem reporting sheet. The Support Center will expect you to quote the incident number in all future calls connected with this problem.

If the problem is new to you, the operator will ask you for the source of the problem within your system software—that is, the program that seems to be the cause of the problem. As you are reading this book, it is likely that you have already identified IBM Tivoli Workload Scheduler for z/OS as the problem source. You will also have to give the IBM Tivoli Workload Scheduler for z/OS version, release, and maintenance level.

You will need to give a severity level for the problem. Severity levels can be 1, 2, or 3, and they have the following meanings:

<b>Severity level 1</b>	Indicates that you are unable to use Tivoli Workload Scheduler for z/OS, resulting in a critical condition that needs immediate attention
<b>Severity level 2</b>	Indicates that you are able to use Tivoli Workload Scheduler for z/OS, but that operation is severely restricted
<b>Severity level 3</b>	Indicates that you are able to use Tivoli Workload Scheduler for z/OS with limited functions, but the problem is not critical to your overall operation.

When deciding the severity of the problem, take care neither to understate it nor to overstate it. The Support Center procedures depend on the severity level so that the most suitable use can be made of their skills and resources. Your problem will normally be dealt with immediately if it is severity level 1.

Finally, the call receipt operator will ask you for a brief description of the problem and might prompt you for keywords associated with the problem. The primary keywords are ABEND, ABENDU, DOC, INCORROUT, LOOP, MSG, PERFM, and WAIT, corresponding exactly to the problem classification types used later in this book. Strings containing other keywords are also useful. These are not predefined and might include such items as a message or message number, an abend code, any parameters known to be associated with the problem, or, for example, the name of a feature of Tivoli Workload Scheduler for z/OS. The keywords will subsequently be used as search arguments on the RETAIN database to see if your problem is a known one that has already been the subject of an authorized program analysis report (APAR).

You will not be asked for any more information at this stage. However, you should keep all the information relevant to the problem, including logs, dumps, and traces.

### **How your problem is processed**

How your problem is subsequently processed depends on its nature. The representative who handles the problem will give you guidance on what is required from you.

Details of your call are passed, using the RETAIN problem management system, to the associated support group. Because your problem is one associated with Tivoli

Workload Scheduler for z/OS, it is put on a Tivoli Workload Scheduler for z/OS queue. The problems are dealt with in order of severity level.

At first, a Level 1 representative will use the keywords that you have provided to search the RETAIN database. If your problem is found to be one already known to IBM, and a fix has been devised for it, a program temporary fix (PTF) can quickly be dispatched to you. If the RETAIN search is unsuccessful, the problem will be passed to a Level 2 representative, who will ask you for more information about your problem over the telephone.

Let the Level 2 representative know if any of the following events occurred before the problem appeared:

- Changes in level of z/OS or licensed programs
- PTFs applied
- Additional features used
- Application programs changed
- Unusual operator action.

You might be asked to give values from a formatted dump or trace table. You might also be asked to carry out some special activity (for example, to set a trap or to use trace with a certain selectivity) and then to report on the results.

It might be necessary to have several follow-up telephone calls, depending on the complexity of the symptoms and your system environment. In every case, the actions taken by you and the Support Center are entered in the PMR. The Level 2 representative can then be acquainted with the full history of the problem before any follow-up call.

If the Level 2 investigation shows that the problem is already known and a fix has been developed, the fix will be sent to you. If the problem is new, an APAR might be submitted. This will be dealt with by the Tivoli Workload Scheduler for z/OS change team.

## Working with the change team

You use APARs to communicate a new problem with a program, in this case Tivoli Workload Scheduler for z/OS, to the change team for the program. When the change team solves the problem, they can, at your request, supply you with an APAR fix, enabling you to get your system running again. Finally, a PTF is produced to replace the module in error, and the APAR is closed.

### The APAR process

The first step in the APAR process is that a Level 2 representative will enter your APAR into the RETAIN system. The APAR text will contain a description of your problem. If you have found a means of bypassing the problem, details of this will be entered as well. Your name is also entered so that the change team knows who to contact if they need to ask anything about the APAR documentation and supporting material (for simplicity, referred to as documentation in the rest of this book).

When the APAR has been entered, you will be given an APAR number. You must write this number on all the documentation you submit to the change team. This number will always be associated with the APAR and its resolution. If a code change is required, this number will be associated with the APAR fix as well.

The next stage in the APAR process involves providing the change team with the necessary documentation. Here is a summary of the things you must do:

1. You must collect the documentation that is required for the APAR. You will be given guidance by the Level 2 representative on precisely what you must send. The documentation that is required will vary, depending on the problem area (see “Collecting the documentation for the APAR”).
2. You must package all the documentation and send it to the change team. The procedure for this is given in “Sending the documentation to the change team” on page 8.
3. You must apply the PTF resulting from the APAR, possibly after testing the fix on your system. This is described in “Obtaining and applying the fix” on page 8.

### Collecting the documentation for the APAR

As a general rule, the documentation you must submit for an APAR includes all the material you need to carry out problem determination. Some of the documentation is common to all Tivoli Workload Scheduler for z/OS problems, and some is specific to particular problems.

Make sure the problem you have described can be seen in the documentation you send. If the problem has ambiguous symptoms, you must reveal the sequence of events leading up to the failure. Tracing is valuable in this respect, but you might be able to provide details that the trace cannot give. You are encouraged to annotate your documentation, if your annotation is legible and if it does not cover up vital information. You can highlight data in any hard copy you send, using transparent highlighting markers. You can also write notes in the margins, preferably using a red pen so that the notes are not overlooked.

**Note:** If you send too little documentation or if it is unreadable, the change team will have to return the APAR marked ‘insufficient documentation’. Therefore, you should prepare your documentation carefully, and send everything that is relevant to the problem.

Here is a list of the documentation you might be asked to submit for an APAR (in this case, documentation also refers to supporting material). However, these are only guidelines; you must find out from your Level 2 representative precisely what documentation you must send for your specific problem.

- Details of the JCL and messages from the jobs that were run when Tivoli Workload Scheduler for z/OS was installed.
- The Tivoli Workload Scheduler for z/OS files that are involved—from both before and after the error. You must supply the contents of the files, as well as their attributes (such as size and block size), and a list of the catalog entries for the VSAM files.
- A storage dump of program load modules.
- A printout of the z/OS SYSLOG message-log file.
- A printout of the Tivoli Workload Scheduler for z/OS message log (EQQMLOG) for each address space.
- A printout of Tivoli Workload Scheduler for z/OS diagnostic files for both the dialog user and the address space. The files are defined by ddname EQQDUMP.
- Information about the route used through the dialog (panel IDs) and the data entered on each panel. A printout of the dialog panels involved with input data is also useful.
- A listing of the job-tracking logs.
- ISPF diagnostic material.
- A description of the Tivoli Workload Scheduler for z/OS configuration.

- A description of the Tivoli Workload Scheduler for z/OS maintenance level—PTFs and APARs applied. System Modification Program/Extended (SMP/E) provides this information.
- Details about your z/OS and JES levels.
- Details of any user modifications.
- The kind of interface the customer uses (Dynamic Workload Console, PIF).

You can use the Tivoli Workload Scheduler for z/OS APAR tape function to collect all important Tivoli Workload Scheduler for z/OS data sets. You might need to modify the JCL that is generated by the APAR tape function so that all event data sets are collected.

### **Sending the documentation to the change team**

The best way to submit documentation to the Support Center is via a communication link. If this is not possible, you can send the documentation in an APAR box, which you can obtain from your local IBM branch office. APAR boxes are clearly marked as such, and they have a panel where you can write tracking information, such as the APAR number.

Place all your documentation and notes in one or more APAR boxes. If you need to use more than one box, make sure that each box is clearly marked. If you include any magnetic tapes, write this clearly on the outside of the box. This will lessen the chance that the tapes will knowingly be stored in magnetic fields strong enough to damage the data. You will also need a mailing label with the address of the Tivoli Workload Scheduler for z/OS change team on it.

When the change team receives the package, they will note this in your APAR record on the RETAIN system. The team will then investigate the problem and occasionally ask you to send more documentation.

### **Obtaining and applying the fix**

When the problem is solved, a code will be entered on RETAIN to close the APAR, and you might be provided with an APAR fix. You can ask your Support Center about the progress of your APAR at any time, particularly if it is a problem of high severity. When the change team has found a fix for your problem, they might want you to test it on your system. If they do ask you to test the fix, you are normally given 2 weeks to do the test and to provide them with feedback. However, you can ask for an extension if you are unable to complete the testing in that time.

When the team is confident that the fix is satisfactory, the APAR is closed. You will receive notification when this happens.

If the solution involves a change to code in a Tivoli Workload Scheduler for z/OS module and no APAR has yet been raised, you might be supplied with a ZAP or a USERMOD. The change will be distributed later as a PTF. If you want a PTF to resolve a specific problem, you can order it explicitly by its PTF number through the IBM Support Center.



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## Chapter 2. Initial problem analysis

This chapter defines problems that might occur in IBM Tivoli Workload Scheduler for z/OS. The external symptoms of each problem are described to help you or an IBM representative to classify your problem. After you identify the problem type, turn to Chapter 3, “Problem analysis procedures,” on page 13 to document the problem further and to build a keyword string. The keyword string will be used by the IBM Support Center to search a database to determine if your problem has been previously reported. You can use a copy of the IBM Tivoli Workload Scheduler for z/OS problem description sheet in Appendix B. Problem description sheet on page 383 to record all the information related to the problem.

---

### Steps in classifying the problem

When you are classifying the problem, you should go through the following steps:

1. Select the related problem-type keyword by matching one or more of the symptoms described in this chapter with the symptoms of your IBM Tivoli Workload Scheduler for z/OS problem.
2. Turn to the corresponding procedure in Chapter 3, “Problem analysis procedures,” and gather the relevant information for your specific problem.
3. Provide the information that is needed for all problems, as described under “Information needed for all problems” on page 18. Continue building the keyword string.

If you are unable to match your problem to any of those described here, you should still compile the information needed for all problems (item 3 above).

---

### Problem-type keywords

The problem-type keywords are used to identify the failure that occurred. The following are the keywords and the problem types they identify:

<b>ABEND</b>	Abnormal termination with a system abend code
<b>ABENDU</b>	Abnormal termination with a user abend code
<b>DOC</b>	Documentation
<b>INCORROUT</b>	Incorrect output
<b>LOOP</b>	Loop
<b>MSG</b>	Message
<b>PERFM</b>	Performance
<b>WAIT</b>	Wait

#### **ABEND**

Choose the **ABEND** keyword when the IBM Tivoli Workload Scheduler for z/OS program comes to an abnormal end with a system abend code. You should also use **ABEND** when any program that services IBM Tivoli Workload Scheduler for z/OS (for example, VTAM<sup>®</sup>) terminates it, and one of the following symptoms appears:

- An abend message at an operator console. The abend message contains the abend code and is found in the system console log.
- A dump is created in a dump data set.

## ABEND

If a message was issued, use the MSG keyword to document it. See “Abnormal termination (ABEND or ABENDU) procedure” on page 13 to describe the problem.

## ABENDU

Choose the **ABENDU** keyword when the IBM Tivoli Workload Scheduler for z/OS program comes to an abnormal end with a user abend code, and the explanation of the abend code states that it is a program error. Also choose this keyword when a user abend (which is not supposed to signify a program error) occurs when it should not occur, according to the explanation. If a message was issued, use the MSG keyword to document it.

See “Abnormal termination (ABEND or ABENDU) procedure” on page 13 to describe the problem.

## DOC

Choose the **DOC** keyword when one or more of the following symptoms appear:

- There is incomplete or inaccurate information in an IBM Tivoli Workload Scheduler for z/OS publication.
- The published description of IBM Tivoli Workload Scheduler for z/OS does not agree with its actual operation.

See “Documentation (DOC) procedure” on page 15 to describe the problem.

**Note:** You should report a documentation problem only when it meets one of the criteria listed. For suggestions or comments about the documentation, use the Readers' Comment Form at the back of this book.

## INCORROUT

Choose the **INCORROUT** keyword when one or more of these symptoms appear:

- You received unexpected output, and the problem does not appear to be a loop.
- The output appears to be incorrect or incomplete.
- The output is formatted incorrectly.
- The output comes from damaged files or from files that are not set up or updated correctly.

Turn to “Incorrect output (INCORROUT) procedure” on page 15 to describe the problem.

## LOOP

Choose the **LOOP** keyword when one or more of the following symptoms exist:

- Part of the program, other than a message, is repeating itself.
- An IBM Tivoli Workload Scheduler for z/OS command has not completed after an expected period of time, and the processor usage is at higher-than-normal levels.
- The processor is used at higher-than-normal levels, a workstation operator experiences terminal lockout, or there is a high channel activity to an IBM Tivoli Workload Scheduler for z/OS database.

Turn to “LOOP procedure” on page 16 to describe the problem.

## MSG

Choose the **MSG** keyword to specify a message failure. You use this keyword when an IBM Tivoli Workload Scheduler for z/OS problem causes an IBM Tivoli Workload Scheduler for z/OS error message. The message might appear at the system console or in the IBM Tivoli Workload Scheduler for z/OS message log, or both. If you use the end-to-end feature, the messages also appear in the STDLIST subdirectory of the work directory (defined by the WRKDIR keyword of the TOPOLOGY statement).

The messages issued by IBM Tivoli Workload Scheduler for z/OS appear in the following formats:

```
EQQFnmC
EQQFFnmC
EQQnnnnC
```

The message is followed by the message text. The variable components represent:

**F or FF** The IBM Tivoli Workload Scheduler for z/OS component that issued the message

**nn, nnn, or nnnn** The message number

**C** A severity code of I (information), W (warning), or E (error).

### IBM Tivoli Workload Scheduler for z/OS message-number examples

```
EQQW002E
EQQSU21E
EQQ0370W
```

The message log of the end-to-end server can list also Tivoli Workload Scheduler messages. They have the following format:

```
AWS<component_code><numeric_identifier><severity>
```

See the Tivoli Workload Scheduler *Administration and Troubleshooting Guide* for message reference.

If the message of the log file contained in the STDLIST directory does not have the EQQ or AWS prefixes, your problem is probably not associated with IBM Tivoli Workload Scheduler for z/OS, and you should not use the MSG keyword.

Turn to “Message (MSG) procedure” on page 16 to describe the problem.

**Note:** In cases such as the following, you might want to use **INCORROUT** in addition to the MSG keyword:

- A message describes conditions that do not apply to the actual program operation.
- A message text has not appeared.
- A message text appears to contain incorrect data.
- IBM Tivoli Workload Scheduler for z/OS has printed a message that starts with EQQ and the message is not documented, or is not documented correctly, in *Messages and Codes*.
- A message is issued under conditions that should not have resulted in it being issued.

### PERFM

Choose the **PERFM** keyword when one or more of the following symptoms appear:

- IBM Tivoli Workload Scheduler for z/OS event processing or commands, including commands entered from a terminal in session with IBM Tivoli Workload Scheduler for z/OS, take an excessive amount of time to complete.
- IBM Tivoli Workload Scheduler for z/OS performance characteristics do not meet explicitly stated expectations. Describe the actual and expected performances and the explicit source of the performance expectation.

Turn to “Performance (PERFM) procedure” on page 17 to describe the problem.

### WAIT

Choose the **WAIT** keyword when one or more of the following symptoms appear:

- The IBM Tivoli Workload Scheduler for z/OS program, or any program that services this program, has suspended activity while waiting for a condition to be satisfied without issuing a message to indicate why it is waiting.
- The console operator cannot enter commands or otherwise communicate with IBM Tivoli Workload Scheduler for z/OS, and IBM Tivoli Workload Scheduler for z/OS does not appear to be in a loop.
- If the last instruction executed was not a WAIT SVC instruction (X'0A01'), you might not be in a true wait state. You should then analyze the problem further to determine whether you are in a loop or executing code as expected.

See “WAIT procedure” on page 17 to describe the problem.

---

## Chapter 3. Problem analysis procedures

This chapter details the procedures that you use to further describe a problem. First, you gather the information for the specific problem type. Then you provide the information that is common to all problems (see “Information needed for all problems” on page 18). You should compile this information even if you are unable to identify the specific problem type.

---

### Information needed for a specific problem type

When you have chosen a problem-type keyword (see “ Chapter 2, “Initial problem analysis””), you need to collect problem documentation and create a keyword string to describe the problem. To do this, gather the information for the specific problem (the associated keyword is in parentheses).

- System or user abnormal-termination procedure (ABEND or ABENDU)
- Documentation procedure (DOC)
- Incorrect output procedure (INCORROUT)
- Loop procedure (LOOP)
- Message procedure (MSG)
- Performance procedure (PERFM)
- Wait procedure (WAIT).

After collecting the documentation using a specific procedure, turn to “Information needed for all problems” on page 18 to complete the problem description. You can use the IBM Tivoli Workload Scheduler for z/OS problem description sheet on page Appendix B. Problem description sheet on page 383 to record all the information related to the problem.

### Abnormal termination (ABEND or ABENDU) procedure

A malfunction in the system can cause an abnormal termination (abend). Abend categories are:

- User abend
- System abend
- Program check abend.

**User abends** originate in the application program. IBM Tivoli Workload Scheduler for z/OS abend codes are documented in Appendix A, “Abend codes,” on page 381 and also in *Messages and Codes*

**System abends** can occur, for example, when a system supervisor-call instruction (SVC) is issued in a program with an incorrect event-control-block (ECB) address. Refer to *z/OS Codes* and *z/OS Messages*

**Program check abends** are hardware-detected error conditions, such as a store to an invalid address or an attempt to execute an invalid instruction.

To correct the problem, you need to know which part of the code the problem is in. For any abend, you need to determine which module failed. For example, was the failure in:

- An IBM Tivoli Workload Scheduler for z/OS module?
- User-written code, an exit, or an IBM Tivoli Workload Scheduler for z/OS program interface (PIF) application?

## Abnormal termination procedure

- Another IBM licensed program running in the IBM Tivoli Workload Scheduler for z/OS address space?
- A PIF application running in another address space?
- The Dynamic Workload Console?

If your IBM Tivoli Workload Scheduler for z/OS problem is an abnormal termination, you should:

1. Determine the name of the active IBM Tivoli Workload Scheduler for z/OS task. The active task can be determined only if you have a dump data set. You can use the SYSMDUMP dump data set and format the output using interactive problem control system (IPCS).
2. Check the name of the failing load module. If the first 3 characters are EQQ, an IBM Tivoli Workload Scheduler for z/OS module has abended.
3. Locate and record the abend code.
4. Locate and record the name of the failing module and the offset of the failing instruction in the current CSECT of that module. The address of the failing instruction is given by the program status word (PSW) at entry to the abend information.

Locate the failing instruction in the dump. The base register will normally be register 11 or 12. Determine the values of these registers by locating the Registers at entry to ABEND area in the dump. Either register 11 or register 12 will have a value that is less than the address of the failing instruction but within X'1000' of this address. This register is the base register, which you use to find the beginning of the failing CSECT in the dump. At offset 5 in the failing CSECT, you will find a module identification that contains the name of the failing CSECT and the compilation date of this CSECT.

5. Record the name and compilation date of the failing CSECT. Calculate and record the offset of the failing instruction in the failing CSECT.
6. Locate the save-area trace information in the dump. You should be able to find a line containing AT EP entry-point-name in the save-area trace. The entry-point-name is the module identification of the failing CSECT. The first word on the same line is the name of the failing load module.
7. Record the name of the failing load module.
8. Compile the required information described in "Information needed for all problems" on page 18.

IBM Tivoli Workload Scheduler for z/OS abend codes are listed in Appendix A, "Abend codes," on page 381.

**Note:** This procedure does not apply to the end-to-end server address space when the failing module is a USS process.

### The diagnostic file (EQQDUMP)

When IBM Tivoli Workload Scheduler for z/OS internal validity checking discovers error conditions within the network communication function, debugging information is written to the IBM Tivoli Workload Scheduler for z/OS diagnostic file (defined by ddname EQQDUMP). For serious error conditions, IBM Tivoli Workload Scheduler for z/OS abends with user code 3999 as well.

The diagnostic information consists of message EQQ0000T, which gives the name of the module in error and the reason for the error, in two 8-byte character strings. IBM Tivoli Workload Scheduler for z/OS also writes a formatted version of the trace table to the diagnostic file. In most situations, IBM Tivoli Workload Scheduler for z/OS will also "snap" the data that it considers to be in error.

**Trace information:** IBM Tivoli Workload Scheduler for z/OS maintains an internal trace to make it possible to see the order that its modules have been invoked in prior to an abend. The trace is wraparound with an end mark after the last trace entry added. Each entry consists of two 8-byte character fields: the module name field and the reason field. The end mark consists of a string of 16 asterisks (X'5C'). For most abnormal terminations, a trace table is written in the diagnostic file (EQQDUMP). These trace entries are intended to be used by IBM staff when they are diagnosing IBM Tivoli Workload Scheduler for z/OS problems.

A trace entry with reason PROLOG is added on entry to the module. Similarly, an entry with EPILOG is added at exit from the module. When trace entries are added for other reasons, the reason is provided in the reason field. When the dump is online, in machine readable format, the trace table can normally be found by scanning the dump and searching for the strings PROLOG or EPILOG. There are several trace tables in the dump—one for each IBM Tivoli Workload Scheduler for z/OS task.

Alternatively, the address of the trace table, and its end mark, can be found in the IBM Tivoli Workload Scheduler for z/OS BIB block. This block is found via register 13 in a dump.

- If the dump was produced by a user abend (3900 or 3999), the address of the BIB is found by looking at offset X'4' of the area that register 13 points to. This offset contains a pointer to another area where the address of the BIB is found at offset X'48'. The BIB block is easy to identify because its first characters hold the string BIB.
- If the dump was produced by any other abend, register 13 points directly to an area where the address of the BIB is found at offset X'48'.

The address of the trace table is found at offset X'440' in the BIB, and the address of the end mark of the trace is found at offset X'448'.

## Documentation (DOC) procedure

If your problem is related to IBM Tivoli Workload Scheduler for z/OS documentation, you should:

1. Identify the order number of the manual that contains the inaccurate information. The order number appears on the back cover of the manual in the form *xxxx-xxxx-yy*, where *yy* is a 2-digit revision code. Be sure to include the revision code if it appears.  
Technical newsletters (TNLs) are issued for some manuals. TNLs consist of updated pages for a manual. If you are reporting inaccurate information contained in a TNL, identify the TNL number. You will find this number, in the form *xxxx-xxxx*, at the top of any page in the TNL.
2. Indicate the page or pages in the document that contain the incorrect or incomplete information.
3. Prepare a description of the problem that was caused by the incorrect or incomplete information.
4. Gather the required documentation described in “Information needed for all problems” on page 18.

## Incorrect output (INCORROUT) procedure

If your problem concerns incorrect output, you should:

1. Specify which output is incorrect.
2. Specify how the output differs from what was expected:

## Incorrect output (INCORROUT) procedure

- Is all or part of the output missing?
- Is the output duplicated?
- Is there more output than expected?
- Is the output incorrect?

**Note:** Sometimes problems with other licensed programs or an exit can generate incorrect output.

3. Compile the required documentation described in “Information needed for all problems” on page 18.

## LOOP procedure

If your problem type is LOOP, you should:

1. Use the IBM Tivoli Workload Scheduler for z/OS message log or system console log to help you identify what happened just before the program loop occurred.
2. Obtain a dump, using the z/OS DUMP command. If the dump options do not include RGN and GRSQ, then both options should be specified as SDATA values on the DUMP command.
3. Document instruction addresses from within the loop, if possible.
4. Provide a description of the situation leading up to the problem.
5. Gather the required documentation described in “Information needed for all problems” on page 18.

## Message (MSG) procedure

If your IBM Tivoli Workload Scheduler for z/OS problem type is MSG, you should:

1. Look up the message in *Messages and Codes* for an explanation. This manual includes information on what action IBM Tivoli Workload Scheduler for z/OS takes and what action the operator should take in response to a message. If you plan to report the problem, gather the documentation before you take action. If the message prefix is AWS, see the *Tivoli Workload Scheduler Troubleshooting and Error Messages*.
2. Copy the message identifier and the message text. The IBM Support Center representative needs the exact message text.
3. Supplement the MSG keyword with the message identifier. You use the supplemented keyword in your keyword string when searching the software support database. The keyword format can be one of the following:

`MSGEQQFnnnC`  
`MSGEQQFFnnnC`  
`MSGEQQnnnnnC`.

The variable components represent:

**F or FF**            The IBM Tivoli Workload Scheduler for z/OS component that issued the message

**nn, nnn, or nnnn**

The message number, from 000 to 999

**C**                    A severity code of I ( information), W (warning), or E (error).



### Message-number examples

```
EQQW002E  
EQQSU21E  
EQQ0370W
```

4. Compile the required documentation described in “Information needed for all problems” on page 18.

## Performance (PERFM) procedure

If your problem concerns performance, you should:

1. Check that all the parameters have been set as described in the section about how tuning the controller and tracker of *Customization and Tuning*.
2. Document the actual performance, the expected performance, and the source of information for the expected performance. If a document is the source, note the order number and page number of the document.
3. Document the information about your operating environment, such as:
  - The number of active initiators, number of TSO users, and number of IBM Tivoli Workload Scheduler for z/OS users connected.
  - Other licensed programs that are active in your environment.
  - Any user modifications to the program. Exits, REXX programs, and command lists can affect performance. You should consider whether the user-installed code, REXX programs, or CLISTs are contributing to the problem.
4. If you are using the end-to-end feature, document the network topology.
5. Document any modifications to your system. Performance problems can be related to various system limitations. Your market division representative might be able to identify possible causes of a performance problem.
6. Compile the required documentation described in “Information needed for all problems” on page 18.
7. Obtain a dump, using the z/OS DUMP command.

## WAIT procedure

If your problem type is WAIT, you should:

1. Research the activity before system activity was suspended, identifying which operation is in the wait state.
2. Specify any messages that were sent to the IBM Tivoli Workload Scheduler for z/OS message log or to the system console.
3. Obtain a dump, using the z/OS DUMP command. If the dump options do not include RGN and GRSQ, then both options should be specified as SDATA values on the DUMP command. Format the trace table contained in the dump, and determine which task issued the WAIT.

Alternatively, determine the module in which the WAIT occurred by locating the address of the last instruction executed. This instruction should be a WAIT SVC (X'0A01'). If not, you should perform further analysis to determine if the program is in a loop or if the code is executing as expected:

- a. Record the name and the compilation date of the module.
- b. Record the offset into the module.
- c. Provide a description of the situation leading up to the problem.

4. Gather the required documentation described in “Information needed for all problems.”

---

### Information needed for all problems

Even when you are unable to identify a problem type, you should gather the following information for any problem you have. Begin your initial problem analysis by examining the contents of the message log data set. Record relevant information on a copy of the IBM Tivoli Workload Scheduler for z/OS problem description sheet provided in Appendix B.

1. Obtain a copy of the IBM Tivoli Workload Scheduler for z/OS message log. This is a sequential data set defined by the EQQMLOG ddname.
2. Record the IBM Tivoli Workload Scheduler for z/OS component ID: 5697-WSZ01. The component ID should be the *first* keyword in the string preceding the problem type and other modifier keywords.
3. Record the maintenance level for all operating environments, particularly those for z/OS, JES, ISPF, and RACF®.
4. Document any additional program temporary fixes (PTFs) or APARs that have been applied to your level of IBM Tivoli Workload Scheduler for z/OS.
5. If the problem is within the network communication function, obtain copies of the IBM Tivoli Workload Scheduler for z/OS EQQDUMP file.
6. Obtain copies of the IBM Tivoli Workload Scheduler for z/OS diagnostic files defined to the user address space and to the subsystem address space by SYSMDUMP.
7. Obtain a copy of the system log.
8. If the problem involves end-to-end scheduling, obtain a copy of the work directory in the following way:
  - a. Identify the work directory. To do this, read in the configuration parameter the value of the WRKDIR keyword of the TOPOLOGY statement.
  - b. Create a tar file of the work directory. To do this:
    - 1) Logon on a USS shell (using OMVS or telnet).
    - 2) Assure that you are running with uid 0 (use the *id* command to see your uid). If you are authorized to the BPX.SUPERUSER RACF facility class, issue the *su* command to obtain uid 0.
    - 3) Create the tar file by entering this command:

```
tar cvzf tarfilename workdirectory
```
  - c. Collect TWSIN and TWSOU.
  - d. Collect the topology information in the PARMLIB library (DD name EQQPARM).
9. Reconstruct the sequence of events leading to the problem. Include any commands entered just before the problem occurred.

Write down the exact events that lead to the problem:

  - a. What was the first indication of the problem?
  - b. What were you trying to do?
  - c. What should have happened?
  - d. What did happen?
  - e. Can you re-create the problem?
10. Specify any unique information about the problem or about your system:
  - a. Indicate any other applications that were running when the problem occurred.
  - b. Describe how IBM Tivoli Workload Scheduler for z/OS was started.

- c. Describe all user modifications to active IBM Tivoli Workload Scheduler for z/OS programs.

If more information is needed, an IBM Support Center representative will guide you concerning any additional diagnostic traces that you can run.

For information about diagnosing problems with the APPC subtask, see the information on page 47.

## Information needed for all problems

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---

## Chapter 4. Functional description

This chapter describes the major components of Tivoli Workload Scheduler for z/OS and how they fit together. These components are described here:

- Dialogs
- Description databases
- Data sets for planning, tracking, and recovery
- Batch programs
- Subsystem
- Task structure
- Subtasks.

---

### Tivoli Workload Scheduler for z/OS dialogs

Most users of Tivoli Workload Scheduler for z/OS functions use interactive system productivity facility (ISPF) panels to communicate with the product. These panels are referred to as *Tivoli Workload Scheduler for z/OS dialogs*. Each dialog user is also a z/OS TSO user executing in a separate address space, or in a different z/OS system.

The dialogs frequently require support from the Tivoli Workload Scheduler for z/OS subsystem. Tivoli Workload Scheduler for z/OS is a started task that must be active to run the dialogs. The z/OS subsystem interface (SSI) is used to pass requests from the user to Tivoli Workload Scheduler for z/OS. To process the request, this subsystem interface invokes a routine residing in common storage. If the dialogs are executed in a different z/OS system, the requests will be sent to a Tivoli Workload Scheduler for z/OS server on an APPC or TCP/IP session. The server will then forward the requests to the Tivoli Workload Scheduler for z/OS subsystem via the z/OS SSI.

Before performing any function requested by a user, the Tivoli Workload Scheduler for z/OS dialog function uses the system authorization facility (SAF) interface to pass the request to RACF (or a functionally equivalent security package). RACF verifies that the user is authorized to access the resources needed to run the current function. The z/OS router service calls RACF to perform this authority check if RACF is installed and active in the z/OS system. A typical request for service from a Tivoli Workload Scheduler for z/OS dialog to the Tivoli Workload Scheduler for z/OS subsystem is to access a set of database records (for example, application description records). The databases, as well as the planning data sets, are maintained and controlled by the started task.

A summary of the system components and interfaces used by Tivoli Workload Scheduler for z/OS dialogs is provided in Figure 1 on page 26.

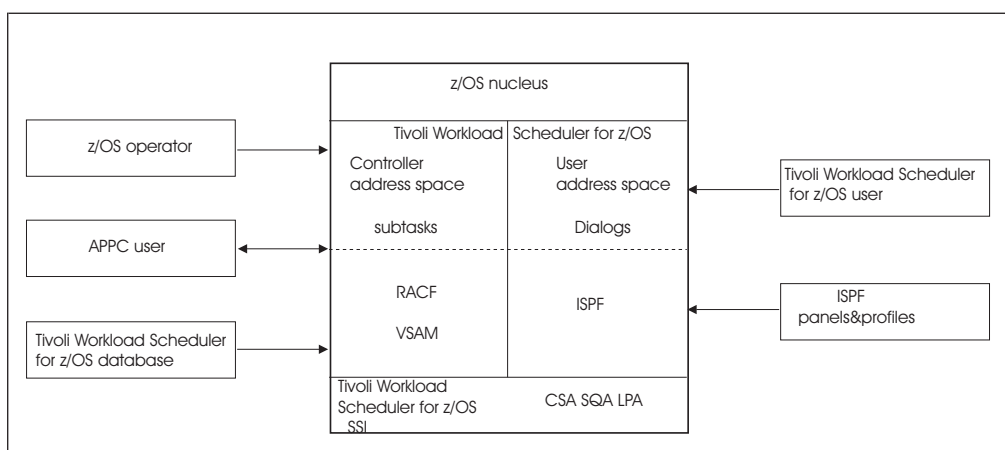


Figure 1. Tivoli Workload Scheduler for z/OS dialog structure

## ISPF tables

The Tivoli Workload Scheduler for z/OS dialogs use a number of resident ISPF tables:

- pref*ACMDS** Is the ISPF command table. The prefix *pref* is the name of the current ISPF application. You can specify this as a value on the NEWAPPL keyword when starting the application.
- pref*AXMDL** Is used to hold information about the dynamic ISPF data tables used in the dialogs (that is, the data tables that are created and deleted during the dialog processing). Typical information includes the table sort order, which resides here from one usage of the dialog to the next. The prefix *pref* is the name of the current ISPF application. You can specify this as a value on the NEWAPPL keyword when starting the application.
- EQQELDEF** Contains the ended-in-error-list default layouts.
- EQQEVERT** Contains definitions of ended-in-error-list layout variables.
- EQQLUDEF** Contains the list of subsystem names and associated LU names that the Tivoli Workload Scheduler for z/OS dialogs user can connect to.
- EQQRLDEF** Contains definitions of the ready list layouts. The layouts in this table cannot be modified or deleted in the WORKSTATION COMMUNICATION dialog.
- EQQRLOUT** Contains definitions of the ready list layouts. The layouts in this table can be modified and deleted in the WORKSTATION COMMUNICATION dialog. New ready-list layouts created by a user are held in this table.
- EQQXVART** Contains definitions of the ISPF data tables used in the dialogs.

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## Tivoli Workload Scheduler for z/OS data

Tivoli Workload Scheduler for z/OS requires data about your installation environment and the work that is to be processed. It keeps this information in description databases. Tivoli Workload Scheduler for z/OS also maintains a number of other data sets for planning, tracking, and recovery purposes. Another set of data is that managed by the Data Store. Tivoli Workload Scheduler for z/OS data resources are described in this section.

## Description databases

The basic data that Tivoli Workload Scheduler for z/OS uses comes from the description databases. These are listed in Table 1.

Table 1. Tivoli Workload Scheduler for z/OS description databases

Database	Physical VSAM data set	DD name
Application description	AD	EQQADDS
Calendar	WS	EQQWSDS
Job descriptions	AD	EQQADDS
Operator instruction	OI	EQQOIDS
Period	WS	EQQWSDS
Special resource description	RD	EQQRDDS
Side information	SI	EQQSIDS
Variable table	AD	EQQADDS
Workstation description	WS	EQQWSDS

### Application Description Database

The application description (AD) database contains application descriptions, which consist of:

- A general part
- A part for each run cycle (except for members of an application group)
- A part for each operation (except for group definitions).

### Calendar database

The calendar (CAL) database contains data about workdays and free days for work processing.

### Job descriptions database

The job descriptions database contains special applications containing a single processing operation.

### Operator instruction database

The operator instruction (OI) database contains operator instructions, each of which corresponds to an operation in the AD database.

### Period database

The period database contains data used to define run cycles for applications.

### Special resources database

The special resources database contains details about individual elements in your installation that you want to identify for scheduling purposes. For example, data sets or tape drives.

### Side information database

The side information database contains event-triggered-tracking (ETT) criteria, which are used to add occurrences to the current plan based on triggering events, and configuration information.

**Variable table database**

The variable table database contains JCL variable definitions, which are grouped into tables. You can associate a variable table with a period, in the period database.

**Workstation description database**

The workstation description database contains information about the different workstations at the installation.

**Data sets used for planning, tracking, and recovery**

Tivoli Workload Scheduler for z/OS maintains two plans, the *long-term plan* and the *current plan*. The event-tracking functions collect status information about the work in progress, store this information in event data sets, and amend the current plan to reflect the status of operations. These planning and event data sets, as well as the data sets that are used for recovery, are described here.

When the end-to-end scheduling with fault tolerance capabilities feature is installed, Tivoli Workload Scheduler for z/OS maintains the following additional data sets:

- Input events data set (EQQTWSIN)
- Output events data set (EQQTWSOU)
- Script library (EQQSCLIB)
- Current<sup>®</sup> plan backup (EQQSCPDS)
- Centralized script data set (EQQTWSCS)

See “Tasks and data sets used for end-to-end scheduling with fault tolerance capabilities” on page 32 for details.

Every Tivoli Workload Scheduler for z/OS address space that uses the Restart and Clean up feature requires the allocation of a local VSAM repository for the structured information related to each job run.

*Table 2. Tivoli Workload Scheduler for z/OS planning, tracking, and recovery resources*

Resource	Physical data sets	DD name
Checkpoint data set	Checkpoint data set	EQQCKPT
Current plan	<ul style="list-style-type: none"> <li>• Primary current plan</li> <li>• Alternate current plan</li> <li>• New current plan</li> <li>• New current plan extension</li> <li>• Current plan extension</li> <li>• Current plan backup for the creation of Symphony™</li> <li>• Primary extended data</li> <li>• Alternate extended data</li> <li>• New extended data</li> </ul>	<ul style="list-style-type: none"> <li>• EQQCP1DS</li> <li>• EQQCP2DS</li> <li>• EQQNCPDS</li> <li>• EQQNCXDS</li> <li>• EQQCXDS</li> <li>• EQQSCPDS</li> <li>• EQQXD1DS</li> <li>• EQQXD2DS</li> <li>• EQQNxDDS</li> </ul>
Centralized script data set for end-to-end scheduling with fault tolerance capabilities	Centralized script	EQQTWSCS
Event data sets for end-to-end scheduling with fault tolerance capabilities	<ul style="list-style-type: none"> <li>• Input events</li> <li>• Output events</li> </ul>	<ul style="list-style-type: none"> <li>• EQQTWSIN</li> <li>• EQQTWSOU</li> </ul>

## Data sets used for planning, tracking, and recovery

Table 2. Tivoli Workload Scheduler for z/OS planning, tracking, and recovery resources (continued)

Resource	Physical data sets	DD name
Script library for end-to-end scheduling with fault tolerance capabilities	Script library	EQQSCLIB
Event data sets	<ul style="list-style-type: none"> <li>Event log</li> <li>Event data set (01–16) for an event reader</li> </ul>	<ul style="list-style-type: none"> <li>EQQEVDs</li> <li>EQQEVDxx</li> </ul>
JCL repository	<ul style="list-style-type: none"> <li>Primary JCL repository</li> <li>Alternate JCL repository</li> </ul>	<ul style="list-style-type: none"> <li>EQQJS1DS</li> <li>EQQJS2DS</li> </ul>
Job library	Partitioned data set for JCL	EQQJBLIB
Job tracking	<ul style="list-style-type: none"> <li>Job-tracking log (maximum 99)</li> <li>JT archive data set</li> </ul>	<ul style="list-style-type: none"> <li>EQQJTxx</li> <li>EQQJTARC</li> </ul>
Long-term plan	Long-term plan	EQQLTDS
Restart and clean up	<ul style="list-style-type: none"> <li>Primary index</li> <li>Secondary index</li> <li>Structured data files</li> </ul>	<ul style="list-style-type: none"> <li>EQQPKIxx</li> <li>EQQSKIxx</li> <li>EQQSDFxx</li> </ul>
Side information	Side information	EQQSIDS

### Checkpoint (EQQCKPT)

The checkpoint data set contains information about which Tivoli Workload Scheduler for z/OS data sets are currently active; for example, in the case of the current plan, the primary or alternate current-plan data set. It also contains record-position information for all event data sets and the Symphony run number.

### Current plan (EQQCPnDS)

The current plan (CP) is created from the LTP, AD, RD, and WS databases. The CP consists of VSAM files created by any of the following daily planning batch programs:

- Plan next period. This creates the initial CP and thereafter extends the CP by modifying it with new information from LTP, AD, RD, WS, and the old CP (if available).
- Replan current period. This reorganizes the CP with new information from the databases.

The CP is also updated dynamically by the job-tracking functions, the MODIFY CURRENT PLAN dialog, the program interface (PIF), the application programming interface (API), Dynamic Workload Console, OCL, BCIT, and by events created from RODM notifications.

Tivoli Workload Scheduler for z/OS uses these VSAM data sets when creating or maintaining the current plan:

- The primary current-plan data set, DD name EQQCP1DS.
- The alternate current-plan data set, DD name EQQCP2DS.
- The new current plan (NCP) data set, DD name EQQNCPPDS.
- The new current plan extension (NCX) data set, DD name EQQNCXDS.
- The current plan extension (CX) data set, DD name EQQCXDS.

## Data sets used for planning, tracking, and recovery

- The current plan backup (SCP) for the creation of the Symphony file, DD name EQQSCPDS.
- The primary "extended data" data set EQQXD1DS
- The alternate "extended data" data set EQQXD2DS
- The new "extended data" data set EQQNXDDS

The "extended data" data sets are used in the same ways as the current plan VSAM files.

When the CP is created, extended, or modified, it is held in the new current-plan data sets, NCP and NCX. The CP turnover process copies the NCP into one of CP1 or CP2 (whichever is inactive), and then this data set becomes the *active* CP. The NCX is copied to the CX data set, and the CX data set is then copied to a data space managed by the controller.

During the creation of the current plan, the SCP data set is used as a CP backup copy for the production of the Symphony file.

The primary and alternate CP data sets (CP1 and CP2), are used in a flip-flop manner; that is, Tivoli Workload Scheduler for z/OS copies the active CP to the inactive data set, and then uses this newly copied data set as the active CP. The active data set is called the CP logical file.

Updates to the CX file are made in the data space. During the current plan backup process, the data space is refreshed to DASD.

For more information, see "Current plan turnover" on page 59.

### **Centralized script data set for end-to-end scheduling with fault tolerance capabilities (EQQTWSCS)**

Tivoli Workload Scheduler for z/OS uses the centralized script data set for end-to-end scheduling with fault tolerance capabilities to temporarily store a script when it is downloaded from the JOBLIB data set to the agent for its submission.

### **Input and output events for end-to-end scheduling with fault tolerance capabilities (EQQTWSIN and EQQTWSOU)**

These data sets are required by every IBM Tivoli Workload Scheduler for z/OS address space that uses end-to-end scheduling with fault tolerance capabilities. They record the descriptions of events related with operations running on fault-tolerant workstations and are used by both the end-to-end enabler task and the translator process in the scheduler's server.

The layouts used to map these files are DCLEVE and DCLEX0. See the corresponding sections for more information.

### **Script library for end-to-end scheduling with fault tolerance capabilities (EQQSCLIB)**

This script library data set includes members containing the job definitions for operations running on fault-tolerant workstations. It is required in the controller if you want to use end-to-end scheduling with fault tolerance capabilities. It is similar to the JOBLIB with the difference that it describes the Tivoli Workload Scheduler jobs. For details about the JOBREC, RECOVERY, and VARSUB statements, refer to *Scheduling End-to-end with Fault Tolerance Capabilities*.

### Event (EQQEVDS and EQQEVNnn)

Each Tivoli Workload Scheduler for z/OS system has an event data set containing records that describe the events that have occurred in the processing of work on that system. The controlling system collects these events in an event log.

The event data set is also used to checkpoint submit actions. The submit subtask uses the first record in the event data set for submit checkpointing.

### JCL repository (EQQJS1DS and EQQJS2DS)

Tivoli Workload Scheduler for z/OS maintains its own copy of JCL in the JCL repository data set for every job that it submits in the current plan. Tivoli Workload Scheduler for z/OS uses a primary and alternate data set for the JCL repository, EQQJS1DS and EQQJS2DS. It reorganizes the JCL repository data set that is in use by copying it to the alternate data set and then switching over to use the newly copied data set. The value you specify on the MAXJSFILE keyword defines if the JCL repository should be automatically copied and how often the automatic copy process should occur. You can also request, or schedule, backups with the BACKUP command (refer to *Managing the Workload* for more information).

JCL is stored on the JS data set for each job that has been submitted in the current plan. When an occurrence is completed, IBM Tivoli Workload Scheduler for z/OS locates all records in the JS data set for that occurrence and flags them as ready for deletion. At the same time, Tivoli Workload Scheduler for z/OS deletes from the JS file all occurrences of the same application, which were previously flagged as ready for deletion. Because JCL records remain on the JS data set until the next occurrence of the same application is set to complete, the JS file should be large enough to hold at least one occurrence of each application that Tivoli Workload Scheduler for z/OS runs. If you delete an occurrence, the JCL is flagged as ready for deletion and is actually deleted when the next occurrence of that application is set to complete.

If you run an application only once, the JCL remains on the JS file indefinitely. If you run many such applications, or run many applications only occasionally, or have changed operation or application names, you can use PIF to remove these unwanted records from the JS file. Two samples, EQQPPIFDJ and EQQPPIFD, are provided in the sample library, which you can use to list records in, or delete records from, the JS file.

The space released in the JS file cannot be reused until the file is compressed. The released space is therefore not available until the copy process is performed.

### Job library data set (EQQJBLIB)

The job library data set contains the JCL for the jobs and started tasks that IBM Tivoli Workload Scheduler for z/OS will submit. It is required by a controller. If you already have a job library that you use for IBM Tivoli Workload Scheduler for z/OS purposes, specify this data set on the EQQJBLIB statement. If not, allocate one before you start the controller.

### Job-tracking (EQQJTxx and EQQJTARC)

The job-tracking log contains data about all updates to the current plan. These are used during recovery to restore the current plan. The job-tracking log also contains audit trail records, which detail accesses to resources.

The job-tracking logs are linked to the new current plan data sets (EQQNCPDS). You can define a maximum of 99 job-tracking logs, with DD name EQQJTxx,

## Data sets used for planning, tracking, and recovery

where *xx* is the sequence number of the JT log. The job-tracking log is switched every time a current-plan copy is performed. (See “Current plan turnover” on page 59).

The job-tracking archive data set is defined by the DD name EQQTARC, and is used by the job-tracking-log archiver subtask as a repository for JT log records associated with each new current plan. The JT archive data set is copied to the tracklog (EQQTROUT) data set by the daily plan batch programs. The NM subtask empties the JT archive data set when a daily plan batch job has created a new current plan, and NCP takeover is completed successfully.

For more information about the job-tracking-log archiver subtask, see “Job-tracking-log archiver (JL)” on page 56.

### Long-term plan (EQQLTDS)

The long-term plan (LTP) is created from the AD, calendar, and period databases. The LTP data set is a VSAM file that is created and updated in any of the following ways:

- Create long-term plan. This creates the initial LTP.
- Extend long-term plan. This extends the LTP by appending new information to it. Depending on the value that you specify for the LTPDEPRES keyword of the BATCHOPTS initialization statement, extending the LTP will either leave the information in the existing LTP period unchanged or modify the old part of the plan.
- Modify or replan the long-term plan. This reorganizes the entire LTP, modifying it with new information from the AD, calendar, and period databases.

### Restart and clean up data sets (EQQPKlxx, EQQSKlxx, and EQQSDFxx)

Every IBM Tivoli Workload Scheduler for z/OS address space that uses the Restart and Clean Up feature requires the allocation of a local VSAM repository for the structured information related to each job run. These data sets have the same structure as the data store VSAM files and can be allocated by running the EQQPCS07 sample. Keep in mind that every IBM Tivoli Workload Scheduler for z/OS requires the allocation of a unique local VSAM repository.

### Side information data set (EQQSIDS)

The side information data set contains event-triggered tracking criteria and JES2 NJE node names. IBM Tivoli Workload Scheduler for z/OS uses the same data set for database functions and current plan functions.

## Tasks and data sets used for end-to-end scheduling with fault tolerance capabilities

Figure 2 on page 33 shows the processes and the data sets used by the controller and by the server for end-to-end scheduling with fault tolerance capabilities.



## Tasks and data sets for fault-tolerant end-to-end scheduling

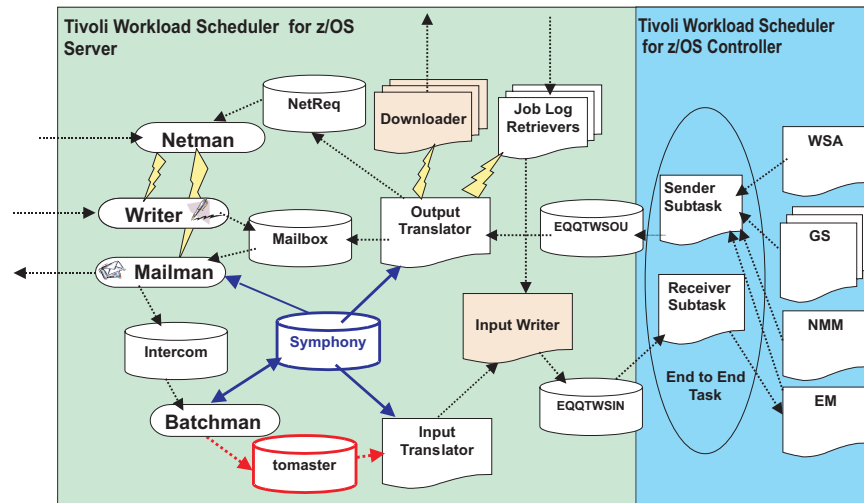


Figure 2. Tivoli Workload Scheduler for z/OS data sets and files for end-to-end scheduling with fault tolerance capabilities

The server address space hosts the tasks and the data sets that function as the intermediaries between the controller and the Tivoli Workload Scheduler domain manager at the other end of the network. In many cases these tasks and data sets are a replica of the Tivoli Workload Scheduler tasks and data sets.

The processes for end-to-end scheduling with fault tolerance capabilities are of two types, according to where they run:

- Controller processes. They are:
  - Sender
  - Receiver
- End-to-end server. They are:
  - Netman
  - Writer
  - Mailman
  - Batchman
  - Job log retriever
  - Output translator
  - Input translator
  - Input writer
  - Downloader

### Netman

Replicates the Tivoli Workload Scheduler process. It starts at system startup. It monitors the NetReq.msg queue and the Tivoli Workload Scheduler TCP/IP port (usually 31111). When it receives a request, it starts the Writer or Mailman processes. The request to start or stop Mailman will come from the Output Translator via the NetReq.msg queue. The request to start or stop Writer will come from Mailman on the Tivoli Workload Scheduler domain manager via the TCP/IP port.

### Writer

Replicates the Tivoli Workload Scheduler process. It is started by Netman on

## Tasks and data sets for fault-tolerant end-to-end scheduling

request from the Mailman of the connected Tivoli Workload Scheduler domain manager. Writer has the task of writing the events that it receives from the remote Mailman in Mailbox.msg.

### Mailman

Replicates the Tivoli Workload Scheduler process. Its main tasks are:

- Routing events. It reads the events stored in the Mailbox.msg queue and sends them either to the controller, writing them in Intercom.msg, or to the remote Writer on the Tivoli Workload Scheduler domain manager.
- Establishing the connection with the domain manager by calling the remote Netman to start Writer.
- Sending the Symphony to the other Tivoli Workload Scheduler nodes when a new Symphony is created.

If defined in the topology, Mailman can start other Mailman processes, called Mailman servers, to manage communication with specific workstations in the MASTERDM domain.

### Batchman

Updates the Symphony file and resolves dependencies at master level. It replicates the functionality of Tivoli Workload Scheduler's Batchman to a limited extent (submission has been removed).

### Job Log Retriever

Receives from each distributed agent the log of a job run on the agent. After the Job Log Retriever has received the log, it sizes the log according to Tivoli Workload Scheduler for z/OS specifications, translates it from UTF-8 to the EBCDIC codepage, and sends it to the Input Writer. The retrieval of a job log is a lengthy operation and users may request several logs at the same time. For this reason, a subtask is started for each job log retrieval. The subtasks are temporary and terminate after the logs are sent to the Input Writer.

### Output Translator

Receives the events in Tivoli Workload Scheduler for z/OS format from the outbound queue and elaborates them to activate the correct Tivoli Workload Scheduler function. It also translates event names from the EBCDIC codepage to UTF-8.

The Output Translator interacts with three different components depending on the type of the event:

- Starts a Job Log Retriever thread if the event is to retrieve the log of a job from a Tivoli Workload Scheduler distributed agent.
- Starts a Downloader thread if the event is to download the script.
- Enqueues an event in NetReq.msg if the event is to start or stop Mailman.
- Enqueues events in Mailbox.msg for the other events that are sent to update the Symphony file on the distributed agents (i.e. events for a job that has changed status, events for manual changes on jobs or workstations, or events to link/unlink workstations).
- Switches the Symphony files.

The Output Translator uses the Tivoli Workload Scheduler libraries to create the events and to enqueue them on the event files.

### Input Translator

Translates the events read from the tomaster.msg to the IBM Tivoli Workload Scheduler for z/OS format, including UTF-8 to EBCDIC translation, and writes them in the inbound queue.

## Tasks and data sets for fault-tolerant end-to-end scheduling

### Sender Task

Is a subtask of the end-to-end scheduling with fault tolerance capabilities task. It receives events from all the controller tasks that make changes in the control program and enqueues the events in the outbound queue. The events are received via SSI that is the usual method the Tivoli Workload Scheduler for z/OS tasks use to exchange events. The tasks that change the control program and that send events to the Sender Task are:

- General service (GS)
- Normal mode manager (NMM)
- Event manager (EM)
- Workstation analyzer (WSA)

The NMM sends events to the Sender Task during the daily planning for synchronization purposes.

### Receiver Task

Is a subtask of the end-to-end scheduling with fault tolerance capabilities task. It receives events from the inbound queue and enqueues them to the Event Manager. The events have already been filtered and elaborated by the Input Translator.

### Input Writer

Receives the input from Job Log Retriever and Input Translator and writes it in the inbound queue (EQQTWSIN).

### Downloader

Sends scripts to remote agents. A thread is started for every script that must be downloaded and ends after the script has been downloaded.

Tivoli Workload Scheduler for z/OS uses the following data sets for end-to-end scheduling with fault tolerance capabilities:

- Data sets on z/OS:
  - EQQTWSIN** Sequential data set used to queue events sent by the server to the controller (inbound queue).
  - EQQTWSOU** Sequential data set used to queue events sent by the controller to the server (outbound queue).
  - EQQSCLIB** Partitioned data set used as a repository for the definitions of the jobs running on distributed agents. This data set is not shown in Figure 2 on page 33.
  - EQQSCPDS** VSAM data set containing a copy of the current plan used by the daily plan batch programs to create the Symphony file. This data set is not shown in Figure 2 on page 33.
  - EQQTWSCS** Sequential data set used to temporarily store a script when it is downloaded from the JOBLIB data set to the agent for its submission. This data set is not shown in Figure 2 on page 33.
- Data sets on USS. The following filelets are in the work directory which is defined through the TOPOLOGY statement.
  - Symphony** File containing the active copy of the plan used by the distributed agents. The daily planning batch job creates the Symnew file. The Translator renames Symphony in Symold and Symnew in Symphony. The Translator creates also the Sinfonia file that contains the copy of the Symphony file used by the distributed agents.

## Tasks and data sets for fault-tolerant end-to-end scheduling

<b>Sinfonia</b>	File containing the distribution copy of the plan used by the distributed agents.
<b>NetReq</b>	File used to queue requests for the Netman process.
<b>Mailbox</b>	File used to queue events sent to the Mailman process.
<b>Intercom</b>	File used to queue events sent to the Batchman process.
<b>Tomaster</b>	File used to queue events sent to the Translator process.

## Data sets used for data store

The Data Store SYSOUT database consists of VSAM and unstructured data files and of primary and secondary indexes. They are described in the following table:

*Table 3. The data store data sets*

Database	Physical data sets	DD name
Structured data files	Data file (01-99)	EQQSDFxx
Primary index	One primary index for each Data Store	EQQPKIxx
Unstructured data files	Data file (01-99)	EQQUDFxx
Secondary index	One secondary index for each Data Store	EQQSKIxx

### Structured data files

The structured data files contain joblog SYSOUTs in a form based on the parsing of the three components of the job log, the JESJCL, the JESYSMSG and the JESMSG LG, especially the first two. User SYSOUTs are excluded from the structuring mode. These files are required.

### Unstructured data files

The unstructured data files contain joblog SYSOUTs in a flat form, as provided by the JES spool. You can check the SYSOUT with the BROWSE JOBLOG function. Note that the unstructured data file can store, if requested, also the user SYSOUTs. The activation of the unstructured data files is optional, depending on appropriate data store parameters.

### Primary index

This contains an entry for each SYSOUT whose data is stored in one of the data files.

### Secondary index

The secondary index is a variable-length key-sequenced data set (KSDS). Because it can be a single record, that corresponds to a specific secondary-key value, it can trace many primary keys.

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## Tivoli Workload Scheduler for z/OS batch programs

The controller includes a set of batch programs for tasks that are not suitable for online processing. The batch programs are submitted from the dialog, using predefined JCL. Before submission, the JCL is modified from the Tivoli Workload Scheduler for z/OS dialog according to user specifications. Some of the batch programs use services provided by the Tivoli Workload Scheduler for z/OS address space.

## Tivoli Workload Scheduler for z/OS batch programs

Tivoli Workload Scheduler for z/OS includes the following batch-program load modules that are called by EQQBATCH:

<b>EQQADCOP</b>	Calculate and print the run dates of an application
<b>EQQADDEP</b>	Produce a cross-reference listing between applications and their external predecessors and successors
<b>EQQADMUP</b>	Mass update the application descriptions
<b>EQQADPRT</b>	Print detailed application descriptions
<b>EQQAXR00</b>	Produce a cross-reference listing for applications
<b>EQQCLPRP</b>	Print the periods
<b>EQQCLPRT</b>	Print the calendars
<b>EQQDNTOP</b>	Produce (extend or create) a new current plan
<b>EQQDOTOP</b>	Print the current plan statistics
<b>EQQDPCOP</b>	Produce a copy of the AD, LTP, RD, SI, and WS VSAM data sets that can be used to produce a trial current plan
<b>EQQDRTOP</b>	Replan all values in the “current” current plan
<b>EQQDSTOP</b>	Renews the Symphony file
<b>EQQDTTOP</b>	Produce a trial current plan
<b>EQQEVPGM</b>	Report events
<b>EQQICTOP</b>	VSAM data set migration program
<b>EQQJVPRT</b>	Print JCL variables
<b>EQQLTCRE</b>	Create the long-term plan
<b>EQQLTMOA</b>	Modify all occurrences in the long-term plan
<b>EQQLTMOO</b>	Modify one application in the long-term plan
<b>EQQLTPRT</b>	Print the long-term plan
<b>EQQLTTRY</b>	Produce a trial long-term plan
<b>EQQOIBAT</b>	Print operator instructions
<b>EQQOIBLK</b>	Mass update operator instructions
<b>EQQPDLF</b>	Purge a data lookaside facility (DLF) object
<b>EQQPURGE</b>	Process DLF purge JCL
<b>EQQWSPRT</b>	Print the workstation descriptions
<b>EQQYLTOP</b>	Create application descriptions and operator instructions
<b>EQQYTOPX</b>	The program interface top module.

Tivoli Workload Scheduler for z/OS also includes the cataloged procedure **EQQRCSIM**, which is used for simulating return codes with step-level restart.

For more information about the batch programs, refer to *Managing the Workload*.

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## The Tivoli Workload Scheduler for z/OS system

This section describes the major subcomponents of the Tivoli Workload Scheduler for z/OS subsystem and their functions.

### Subsystem early code - EQQINITJ

Each z/OS subsystem builds a subsystem vector table (SSVT) control block that defines what functions are supported by that subsystem. The Tivoli Workload Scheduler for z/OS SSVT is built by a separate module, EQQINITJ, which is invoked during the master scheduler initialization at IPL. EQQINITJ does the following:

- Sets the UPSS bit in the (SSVT) so that Tivoli Workload Scheduler for z/OS can be started under JES
- Builds common storage area (CSA) control blocks to queue events until Tivoli Workload Scheduler for z/OS is started
- Builds a subsystem extension (SSX) block and chains it to the SSVT
- Builds an SSVT and chains it to the subsystem communication vector table (SSCVT).

The SSVT that EQQINITJ builds specifies that IBM Tivoli Workload Scheduler for z/OS supports two subsystem calls:

- A request for service from a Tivoli Workload Scheduler for z/OS dialog (type 67)
- A notification about a tracking event (type 68).

The code that is required to support these two subsystem calls is contained in a separate load module, EQQSSCMJ. This module is loaded in ECSA by EQQINITJ processing at IPL. It can be temporarily replaced when the Tivoli Workload Scheduler for z/OS address space is started using the SSCMNAME keyword of OPCOPTS (refer to *Customization and Tuning*).

#### Tivoli Workload Scheduler for z/OS interface component

The Tivoli Workload Scheduler for z/OS subsystem interface component consists of:

- The Tivoli Workload Scheduler for z/OS SSVT. The SSVT is built by the EQQINITJ module during the master scheduler initialization and is located in key zero, CSA storage (subpool 241).
- The modules that implement the passing of a request from the caller address space to the Tivoli Workload Scheduler for z/OS address space. These routines are located in the EQQSSCMJ module.

An SSVT can support up to 256 function calls. The Tivoli Workload Scheduler for z/OS SSVT supports two function calls. The first call is issued by Tivoli Workload Scheduler for z/OS dialogs; the second is used by event-tracking exits.

z/OS and JES exits supplied with Tivoli Workload Scheduler for z/OS request service by directing the SSI request to the MSTR subsystem. These function calls cause the master subsystem to invoke all defined subsystems.

#### Requesting Tivoli Workload Scheduler for z/OS service

Requests for Tivoli Workload Scheduler for z/OS subsystem services from these sources are passed to the product using the z/OS subsystem interface:

- Event-tracking routines. These are versions of standard z/OS and JES exits that are supplied by Tivoli Workload Scheduler for z/OS and that invoke services by issuing the EQQEXIT macro. The EQQEXIT macro generates code to invoke Tivoli Workload Scheduler for z/OS services correctly.
- TSO users running Tivoli Workload Scheduler for z/OS dialogs in an ISPF environment. The dialogs invoke Tivoli Workload Scheduler for z/OS services by calling the TSO service facility, which in turn calls the EQQMINOJ module.

The EQQMINOJ module is APF-authorized and is able to use the z/OS subsystem interface to request service from Tivoli Workload Scheduler for z/OS.

- The Tivoli Workload Scheduler for z/OS server handles requests from remote dialog users or PIF applications, or from the GUI. The requests are forwarded to the subsystem via the EQQMINOJ module, that uses the z/OS subsystem interface.
- The program interface, the batch loader, and the event generation program (EQQEVPGM).

Requests for Tivoli Workload Scheduler for z/OS subsystem services can also be made through the application programming interface (API).

As a result of calling the z/OS subsystem interface, the module EQQSSCMJ is invoked. This module is loaded during the master scheduler initialization and resides in the link pack area (LPA) or CSA, depending on whether it is loaded from SYS1.LPALIB or SYS1.LINKLIB. The EQQSSCMJ routine provides the interface to the Tivoli Workload Scheduler for z/OS address space.

If the service requester is an event-tracking routine, the EQQSSCMJ module is called once for each Tivoli Workload Scheduler for z/OS subsystem that is defined. If the service requester is a Tivoli Workload Scheduler for z/OS dialog, the EQQSSCMJ module is called only for one specific The subsystem determined by the subsystem name that the TSO user has defined in the dialog initialization panel.

If EQQSSCMJ is called for a job-tracking event, an exit event record is built and added to a Tivoli Workload Scheduler for z/OS queue that is serviced by the event writer (EW) subtask. (This subtask is described in “Event writer (EW)” on page 51. The job-tracking caller does not wait for service from the event writer. Instead, the job-tracking caller returns after updating the EW queue.

If EQQSSCMJ is called for a dialog service request, an entry is added to a Tivoli Workload Scheduler for z/OS queue that is serviced by the general service (GS) subtask. (This subtask is described in “General service (GS)” on page 55.) If a GS subtask is active, the request is dequeued and processed. The dialog user caller waits for service from the GS subtask. When the service is performed, the GS subtask posts the waiting dialog. The EQQSSCMJ module then returns to EQQMINOJ, which in turn returns to the Tivoli Workload Scheduler for z/OS dialog.

## Subsystem address space - EQQMAJOR

Tivoli Workload Scheduler for z/OS is a z/OS started task that is implemented by the EQQMAJOR load module. To run successfully, this load module must reside in an APF-authorized library. It is link-edited with the AC(1) and AMODE(31) attributes.

EQQMAJOR performs the following tasks:

- Address space initialization:
  - Set up ESTAE recovery.
  - Establish an address-space-level and TCB-level resource manager.
  - Process initialization file.
  - Open all required files.

## Subsystem address space - EQQMAJOR

- Update the SSX with Tivoli Workload Scheduler for z/OS TCB and ASCB addresses to indicate (to Tivoli Workload Scheduler for z/OS-subsystem-interface routines) that the product is active.
- Address space termination:
  - Clear Tivoli Workload Scheduler for z/OS TCB and ASCB addresses from the SSX to indicate (to Tivoli Workload Scheduler for z/OS-subsystem-interface routines) that the product is not active.
  - Close all open files.
  - Cancel ESTAE recovery.
- Address space recovery:
  - Create diagnostic information.
  - Determine the retry routine to be used.
  - Return to RTM via SETRP retry.

The subsystem job-step task (EQQMAJOR) builds the Tivoli Workload Scheduler for z/OS environment. EQQMAJOR invokes the subsystem task dispatcher, EQQZMAIN. The majority of Tivoli Workload Scheduler for z/OS functions are performed by subtasks to EQQZMAIN. EQQZMAIN attaches these subtasks to execute the various subfunctions of the subsystem. The initialization parameters that are passed to Tivoli Workload Scheduler for z/OS (from the parameter library, EQQPARM) determine which subtasks will be activated.

## Subsystem task dispatcher - EQQZMAIN

After Tivoli Workload Scheduler for z/OS is started and initialization is complete, the subsystem task waits for more work. EQQZMAIN, the subsystem task dispatcher, then performs one of the following:

- Attaches subtasks (if required)
- Requests subtasks to terminate (if Tivoli Workload Scheduler for z/OS is stopping)
- Returns to caller (if no events are pending)
- Invokes the wait routine.

Tivoli Workload Scheduler for z/OS monitors its subtasks by referring to a table that has one entry for each possible subtask. Each entry in this table contains:

- The name of the task
- The name of the load module to be given control
- The TCB address of the subtask
- The ECB that each Tivoli Workload Scheduler for z/OS will post when the subtask is to terminate
- Status information.

All subtasks are expected to terminate only when their stop-ECBs are posted. If a subtask has ended unexpectedly, Tivoli Workload Scheduler for z/OS checks the corresponding entry in the subtask table to determine if the task should be reattached. If so, the task is restarted.

If Tivoli Workload Scheduler for z/OS is requested to stop, all the active subtasks are posted to stop processing. The product then waits for the subtasks to end.

### Message-writer routine

Tivoli Workload Scheduler for z/OS passes the address of a Tivoli Workload Scheduler for z/OS communication area (the MCA block) to each subtask it attaches. The MCA contains data shared by subtasks and the addresses of common subroutines.



One of these common routines is the message-writer routine. All Tivoli Workload Scheduler for z/OS subtasks use this routine to issue messages to the operator and to the Tivoli Workload Scheduler for z/OS message-log file.

### Server address space - EQQSERVR

The Tivoli Workload Scheduler for z/OS server is a z/OS started task that is implemented by the EQQSERVR load module. To run successfully, this load module must reside in an APF-authorized library. It is link-edited with the AC(1) and AMODE(31) attributes.

The server must run on the same z/OS system where the served controller is started.

EQQSERVR performs the following tasks:

- Address space initialization:
  - Set up ESTAE recovery
  - Process initialization file
  - Attach the main server task
- Address space termination:
  - Detach the main server task
  - Cancel ESTAE recovery
- Address space recovery:
  - Create diagnostic information
  - Determine the retry routine to be used
  - Return to RTM via SETRP retry

The server job-step task (EQQSERVR) attaches the main server task (EQQPHTOP), and waits for operator commands. All the server processing is performed by the EQQPHTOP and its subtasks.

### Main server task - EQQPHTOP

This subtask is attached by EQQSERVR when initialization is complete. The major tasks performed by EQQPHTOP are:

*For APPC:*

- Initialize to APPC as scheduler
- Wait for one of the following events to occur:
  - An allocation request is received from APPC for a new connection. EQQPHTOP attaches an EQQPHAPP subtask to handle this connection.
  - The stop ECB is posted. In this case, EQQPHTOP will propagate the termination to all the subtasks by posting their stop ECB, will terminate itself as an APPC scheduler, and will return to the caller.

*For end-to-end scheduling with fault tolerance capabilities:*

- Start the EQQPWAPP task to communicate with the distributed network, if the TPLGYPARM keyword was specified among the server parameters in the SERVOPTS statement,

The EQQPHTOP task ends when all the subtasks ended.

### Data store address space – EQQFARCH

The Tivoli Workload Scheduler for z/OS data store is a z/OS started task that is implemented by the EQQFARCH load module. To run successfully, this load module must reside in an APF-authorized library. It is link-edited with the AC(1) and AMODE(31) attributes.

EQQFARCH is the top module of the Data Store Started Task Control. It basically loads and calls the EQQFARMJ module, that performs the following tasks:

- Initialization of Data Store parameters
- Initialization, synchronization, and termination of all Data Store subtasks. In particular for the synchronization function, EQQFARMJ builds an event table to manage wait/post requests which synchronize the different subtask activity.

Refer to “Tivoli Workload Scheduler for z/OS data store task structure” on page 45 and “Tivoli Workload Scheduler for z/OS data store subtasks” on page 68 for more information about the subtask functions and their interaction.

---

## Tivoli Workload Scheduler for z/OS task structure

The task dispatcher, EQQZMAIN, waits for one of the following events to occur:

- A stop or a modify command entered by the z/OS operator. If an operator stop command is received, all the subtasks are posted to terminate.
- A message created by a subtask. When messages are created by Tivoli Workload Scheduler for z/OS subtasks, they are formatted and written to the message log data set.
- Subtask termination.

The subsystem job-step task ends when all subtasks have ended.

Figure 3 on page 43 shows the tasks that can be started as subtasks by the job-step task when Tivoli Workload Scheduler for z/OS is installed.

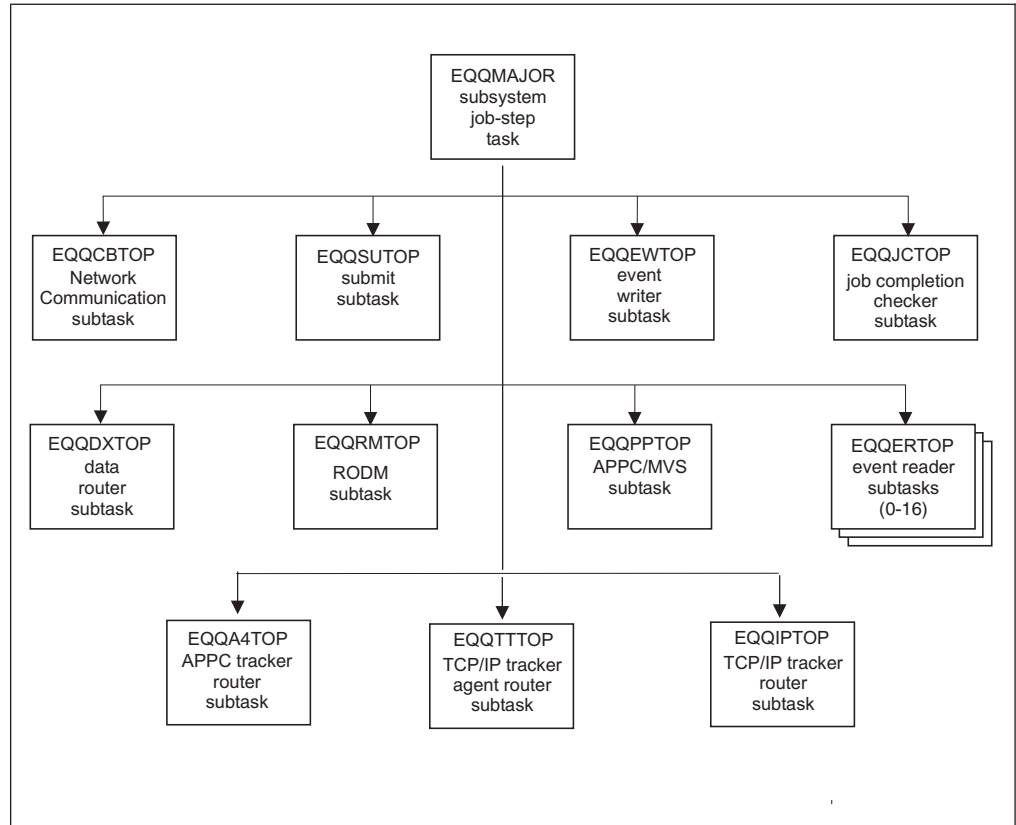


Figure 3. Tivoli Workload Scheduler for z/OS subsystem tasks

If the controller is installed on the system, the normal-mode-manager (NM) subtask will be attached. The NM subtask will attach the tasks that reference the current plan as subtasks. These tasks are shown in Figure 4 on page 44.

## Server task structure

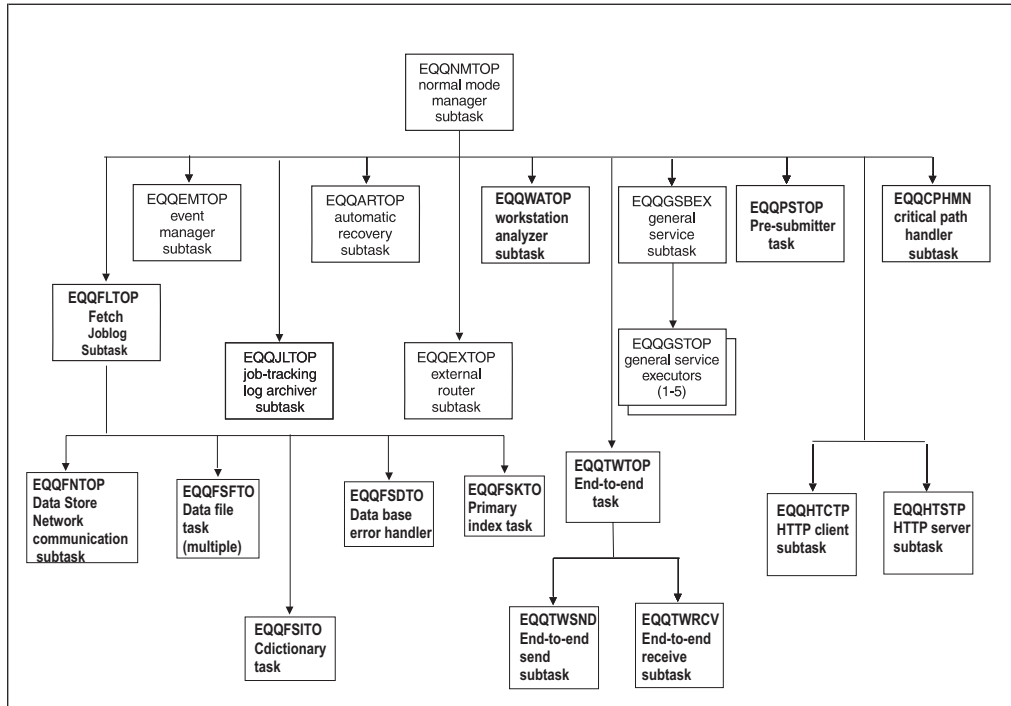


Figure 4. Controller subtasks

## Tivoli Workload Scheduler for z/OS server task structure

The main server task, `EQQPHTOP`, is attached by main task `EQQSERVR`. If you are using the APPC communication protocol, for each new conversation a new instance of `EQQPHAPP` subtask is attached. If you are using the TCP/IP communication protocol, for each new connection a new instance of `EQQPTAPP` subtask is attached. The `EQQPWAPP` subtask is attached for end-to-end scheduling with fault tolerance capabilities. It triggers the server processes for end-to-end scheduling. Figure 5 on page 45 shows the task structure of the Tivoli Workload Scheduler for z/OS server address space.

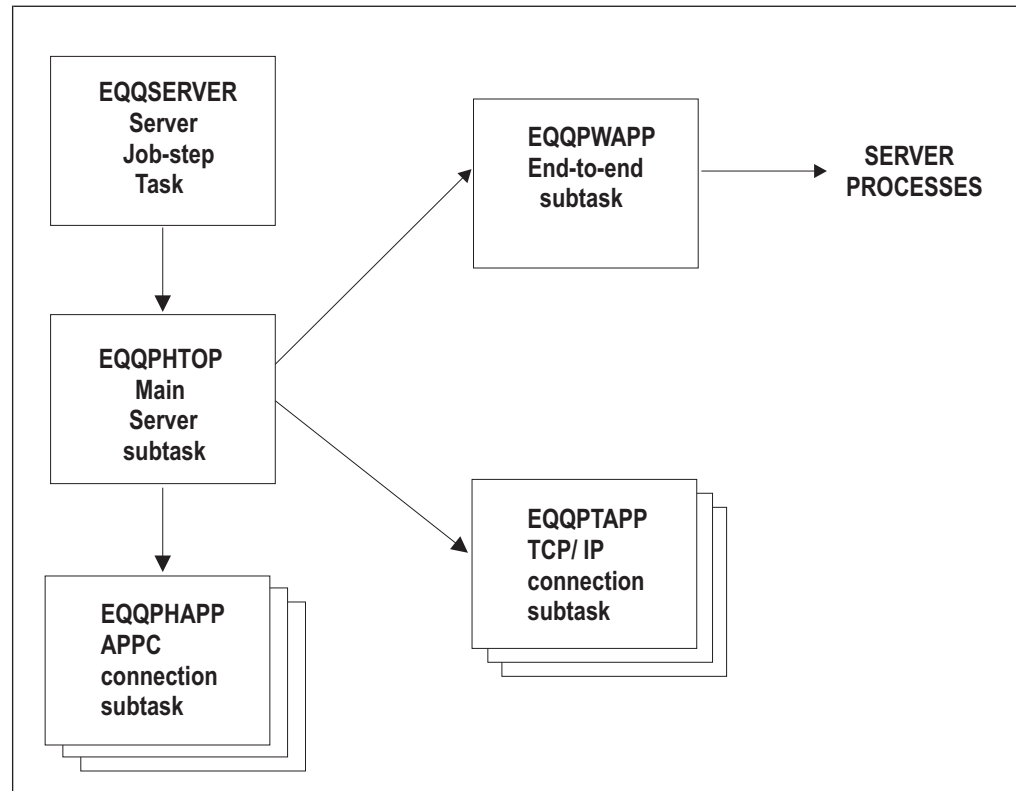


Figure 5. Tivoli Workload Scheduler for z/OS server tasks

Figure 6 shows the end-to-end server processes started by the EQQPWAPP subtask.

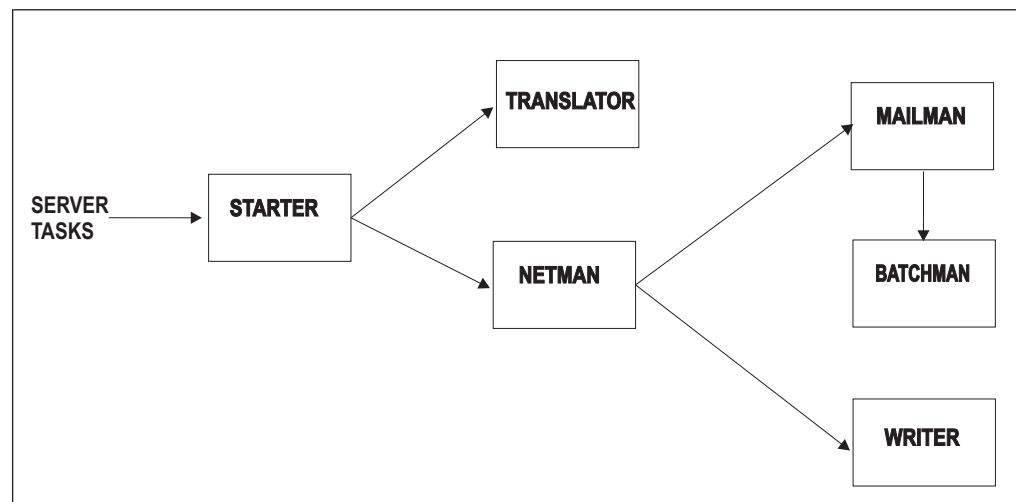


Figure 6. Tivoli Workload Scheduler for z/OS server processes for end-to-end scheduling with fault tolerance capabilities

## Tivoli Workload Scheduler for z/OS data store task structure

When EQQFARCH is started, EQQFARMJ initializes and activates the main subtasks and initializes the database. Depending on the number of data files referenced in the startup JCL, different data file subtasks are also activated. Figure 7 on page 46 shows the task structure of the Tivoli Workload Scheduler for

## Data store task structure

z/OS Data Store address space.

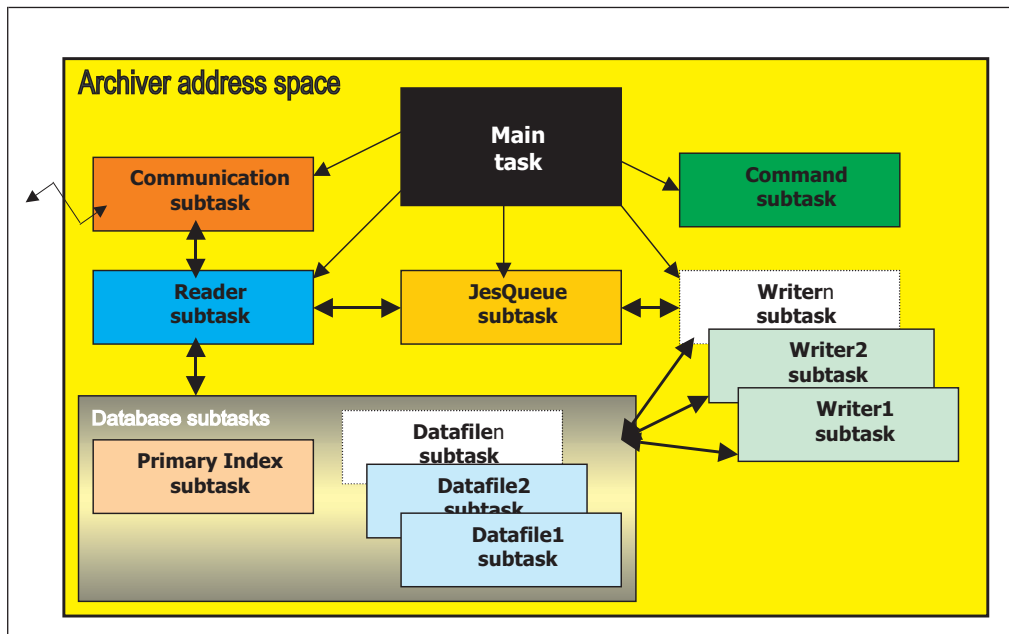


Figure 7. Tivoli Workload Scheduler for z/OS data store address space structure

## Tivoli Workload Scheduler for z/OS subtasks

This section describes the tasks that can be started as subtasks to the Tivoli Workload Scheduler for z/OS subsystem.

### APPC (PP)

The APPC (PP) subtask lets you connect to programs running on any Systems Application Architecture<sup>®</sup> (SAA) platform, and any other platforms that conform to CPI-C protocol, which support Advanced Program-to-Program Communications (APPC). APPC is the term used to refer to an implementation of Systems Network Architecture (SNA) for logical unit (LU) type 6.2.

The application programming interface (API) is provided to enable your application transaction program (ATP) to establish a *conversation* with the Tivoli Workload Scheduler for z/OS subsystem. The API uses a subset of Common Programming Interface for Communications (CPI-C) calls, send and receive buffer mappings, and a call-sequence protocol. Your programs access the Tivoli Workload Scheduler for z/OS address space data by providing calls to the APPC API. You can regard the set of APPC verbs as a programming language that you can write conversations in. The Tivoli Workload Scheduler for z/OS API lets your own programs:

- Extract information about the current plan (GET request)
- Update or add current-plan operations (PUT request)
- Delete operations in the current plan (DEL request)
- Report events to Tivoli Workload Scheduler for z/OS (CREATE request).

For more information about the API, refer to *Programming Interfaces*. For more information about CPI-C, refer to *Common Programming Interface: Communications Reference* in the Systems Application Architecture (SAA) library.

Tivoli Workload Scheduler for z/OS is an APPC transaction scheduler; the scheduler name is the same as the subsystem name. By associating the scheduler with a logical unit in the APPCPMnn member of SYS1.PARMLIB, all allocate requests directed to this LU are passed to the subsystem. Tivoli Workload Scheduler for z/OS then schedules a partner transaction program (TP) in its own address space. The originating TP issues a request and waits for the complete reply, before issuing a new request or deallocating the conversation.

Tivoli Workload Scheduler for z/OS recognizes these TP names:

<b>EQQTRK</b>	Supplied by trackers that communicate with the controller through APPC
<b>EQQAPI</b>	Supplied by user programs (ATPs) that communicate with Tivoli Workload Scheduler for z/OS through the API.

The APPC subtask is attached by the subsystem task. The subtask creates a new queue and table with one entry for each conversation. This entry contains data received from APPC about this conversation and parameter list areas, including the event control block (ECB), used for all asynchronous requests.

APPC and Tivoli Workload Scheduler for z/OS interface in this way:

- The queue server contains a *work-to-do* loop, which waits on an ECB list. Initially, this ECB list contains a stop-ECB and a queue-ECB. The Tivoli Workload Scheduler for z/OS tracker attaches and detaches APPC.
- Inbound allocation messages are placed on the APPC queue (APPQ) by the APPC cross-system coupling facility (XCF) message exit. When this message is detected on the queue, a new entry is added to the conversation table, and the ECB is added to the ECB list.
- The subtask interfaces with the system security product through SAF RACROUTE calls, using the security token and local LU name. If the user does not have read or update access, the request is rejected immediately and the conversation deallocated with `security_invalid`. Tivoli Workload Scheduler for z/OS checks security for every request to ensure that authority has not been changed.
- Tivoli Workload Scheduler for z/OS places inbound requests GET, PUT, or DEL, on the general services (GS) queue, or calls the subsystem interface (SSI) for CREATE requests. Tivoli Workload Scheduler for z/OS issues receive requests until `state_received=send`, before placing a request block on the GS queue or calling the SSI. All other entries in the table are checked for posted ECBs and the program then returns to a WAIT state.
- For GET, PUT, or DEL requests, GS places the requested data on the APPC queue (APPQ). In case of error, GS generates an error return code and reason code.
- APPC builds an outbound APP buffer. When all requested data is sent, the program returns to a WAIT state. Processing continues until the subtask is stopped or the conversation ends (`state_received=deallocate_normal`). The entry in the table is deleted and the ECB list is rebuilt. This also happens if severe errors occurring during the conversation.

If APPC fails, Tivoli Workload Scheduler for z/OS deallocates the conversation and deletes the entry in the table. You are informed of this situation, and should mask this event from your end-user by initiating a new *allocate* before sending a new request. If Tivoli Workload Scheduler for z/OS is stopped, all conversations are deallocated.

Tivoli Workload Scheduler for z/OS supports many conversations. The table is retained across APPC subtask sessions. Requests outstanding at the time APPC is closed are deallocated.

### Automatic recovery (AR)

The automatic recovery (AR) subtask handles automatic recovery requests. A z/OS job, a started-task procedure, or a job using the centralized script can contain recovery statements that specify an error situation and the recovery actions to be performed if the job or procedure fails during processing.

The AR subtask scans the failing jobs or started tasks for a recovery statement that matches the particular error. If a matching recovery statement is found, the requested recovery actions are performed. When a recovery statement matches an error condition it is changed by Tivoli Workload Scheduler for z/OS to a JCL comment statement.

RECOVER statements are defined in the job input as z/OS statements. The statement is changed when the operation is submitted to a valid comment statement for the target operating system. The image of the job input in the JOBLIB is not altered.

The following input is needed for the AR subtask:

- The job-name-table record of the current plan. When the job or procedure is run, this record saves error information, the completion codes of each step executed, and the job completion code.
- The ended-in-error record of the current plan. When a job or started-task procedure ends in error and an ended-in-error entry is created, an indicator is set in this entry. This indicator shows that the JCL or procedure should be checked for automatic recovery statements. The indicator can also be set at a later time from the HANDLING OPERATIONS ENDED IN ERROR panel in the MODIFY CURRENT PLAN dialog. The AR subtask resets the indicator when you select the entry for processing.
- The JCL repository (JS) data set. The AR subtask gets the JCL and automatic recovery statements for the failed job from this file.
- An event control block (ECB) in the normal-mode-manager control block NMMARECB. When this ECB is posted, AR investigates the ended-in-error records of the current plan for automatic recovery requests.
- Options of the AROPTS initialization statement. Using these options, you can restrict when an automatic recovery should be performed.
- The case code macro EQQCASEC.
- A list of case code definitions created by EQQCASEC.

AR invokes other components of the Tivoli Workload Scheduler for z/OS subsystem. The logical-file-handler component is called to accomplish the VSAM input/output operations that are required. The modify-current-plan function of the Tivoli Workload Scheduler for z/OS subsystem is called to perform the actions specified in the recovery statement.

### Critical path handler (CPH)

The critical path handler (CPH) subtask updates the critical job table, which is a table of storage control blocks, containing an entry for each critical job and each predecessor to a critical job. The scheduler allocates the critical job table in a data space, as it does for the special resources control blocks.



Only the CPH subtask can update the critical job table, using a queue driven mechanism. Any task that requests to update the critical job table adds an element to the queue named CPHQ. The CPH subtask serves this queue, by using an internal timer to wake up periodically and check the critical job table data: the process recalculates a critical path every time a predecessor of the target operation starts delaying for one of the following reasons:

- It is late, meaning that it did not start within its latest start time.
- It is long running, meaning that it is running longer than its estimated duration.
- It ends with an error.

If the critical path changed, the scheduler updates the current plan.

## Data router (DX)

Tivoli Workload Scheduler for z/OS subtasks communicate with each other within the system and among systems. The data router (DX) subtask routes data from the components that send data to those that receive data. The following Tivoli Workload Scheduler for z/OS subtasks send data for processing to other subtasks via the DX subtask:

- Event reader subtask (sends events)
- Event writer subtask (sends events)
- Workstation analyzer subtask (sends JCL, commands, release requests, and WTO messages)
- Network communication function (CB) subtask.

The following Tivoli Workload Scheduler for z/OS subtasks receive data from the DX subtask:

- Event manager subtask (processes events)
- Submit subtask (submits JCL)
- Network communication function (CB) subtask.

When a sending component transmits data to a receiving component, the sending component puts the data on a router queue for processing by the DX subtask. The subtask can send the data to a component on the same Tivoli Workload Scheduler for z/OS system as the sending component or to a component on another Tivoli Workload Scheduler for z/OS system.

The DX subtask passes the data directly to the receiving component when the sending and receiving components reside on the same system. When the data is sent to another Tivoli Workload Scheduler for z/OS system, the DX subtask transmits the data to the DX subtask on that system. The receiving DX subtask then passes that data to the receiving component on that system. One of three methods is used to transmit data between systems:

- Shared DASD
- Cross-system coupling facility (XCF) communication links
- SNA communication links.
- TCP/IP communication link

Sometimes other components are involved in routing data between Tivoli Workload Scheduler for z/OS systems:

- When you are using SNA communication links, the network communication function (CB) performs the transmission.
- When data is transmitted via shared DASD, the DX subtask on the transmitting system writes the data to a submit/release data set. The event writer subtask on

## Data router (DX)

the receiving system reads the data and passes it to the router queue. The DX subtask processes the data and then passes it to the correct component for processing.

- When an operation is ready to be started on a workstation that specifies a user-defined destination, the DX subtask queues the request to the external router (EX) subtask. The EX subtask calls the operation-initiation exit, EQQUX009, to handle communications with the user-defined destination.

## Event manager (EM)

The event manager (EM) subtask processes job-tracking, and user-created events, and updates the current plan accordingly. Event records are passed from a number of event writers via event reader subtasks, the network communication function, and XCF, and are passed to the EM queue via the data router subtask. The EM subtask calls a queue handler routine to retrieve events from the queue. Tivoli Workload Scheduler for z/OS produces tracking, submission, and synch events. Tracking events are preceded by the letter A (for JES2 complexes) or by the letter B (for JES3 complexes).

**Note:** Tivoli Workload Scheduler for z/OS does not track jobs with TYPRUN=SCAN.

The z/OS tracking events are:

- 1 Reader event
- 2 Start event
- 3S Step-end events
- 3J Job or started-task end event
- 3P Job or started-task termination event
- 4 Print-end event
- 5 Purge event.

The submit events are:

- IJ0 Submit synch event
- IJ1 Submit job JCL
- IJ2 Submit started-task JCL
- IJ3 Submit standalone cleanup job
- IWTO Submit WTO message
- IREL Submit a release command

User-created events (created with the EQQUUSIN $x$  subroutines or the corresponding TSO commands) are sorted between jobs in event-creation order.

Events started by distributed agents are 0-type event records.

Most events processed by the queue handler subroutine are automatically created job-tracking events. To process the event, the subroutine:

- Updates the event reader position of the event data set that this event was read from.
- Checks if the event is for an operation defined in the current plan.
  - If the event is for an operation that can be matched with an operation in the current plan, the event manager processes the event by updating the current plan.

- If the event is not for an operation that is controlled by Tivoli Workload Scheduler for z/OS but is a reader event, a start event, or a user event with status Q, the EM checks if the event matches an event-triggered tracking (ETT) trigger, if ETT is active.
- If the event is not for an operation that is controlled by Tivoli Workload Scheduler for z/OS and the job is held by the Tivoli Workload Scheduler for z/OS subsystem (via the HOLDJOB parameter of the EWTROPTS initialization statement), EM releases the job from hold.
- Writes a record to the current job-tracking log if the event is for a Tivoli Workload Scheduler for z/OS operation and was successfully processed.
- If the event is for a Tivoli Workload Scheduler for z/OS submit synchronization response, the operations for the corresponding workstation are analyzed; if the submit requests are lost, the operations are flagged as requiring the submit requests to be resent, and the workstation analyzer is posted.
- If the event is for a Tivoli Workload Scheduler for z/OS job but cannot be processed immediately, the EM updates the job-tracking log and places the event on a suspend chain. Suspended events are examined by the EM every time the subtask gets control. If the event cannot be successfully matched against an operation in the current plan within 5 minutes, the event is discarded. If the event can be matched but is received out of sequence and is still out of sequence after 5 minutes, the event is processed and the operation might be set to ended in error status.

Subtask initialization consists of building the EM environment and opening all logical VSAM files that are required.

Subtask mainline logic consists of providing service for the following events:

- Timer expiration. Retry processing of suspended events.
- Subtask stop request.
- Add an event record to the event manager queue.

Subtask termination consists of closing all open files.

## Event reader (ER)

The event reader (ER) subtask provides support for reading event records from an event data set. If new data arrives in this data set, it is read and passed to an in-storage queue (the event manager queue) via the data router subtask.

Subtask initialization consists of building control blocks for the ER subtask, reading and processing the parameter library member, and opening the input event data set.

Subtask mainline logic provides service for the following events:

- Timer expiration. Process the event data set.
- Subtask stop request. Return to caller.
- Reading suspend request. Start/stop reading from the event data set.

Up to 16 ER subtasks can be started for each Tivoli Workload Scheduler for z/OS subsystem.

## Event writer (EW)

The event writer (EW) subtask provides support for writing event records to an event data set. An event record is built from job-tracking-exit records that are transmitted to the EW subtask via an in-storage queue, the WTRQ queue.

## Event writer (EW)

The EW subtask also regularly checks the contents of a submit/release data set. If new data arrives in this data set, the data is read and passed via the data router subtask to the submit subtask for processing. Data in the submit/release data set is either a release-job record or one or more submit-job records.

The EW subtask passes job and started-task termination (3P) events to the job completion checker (JC) subtask if the JC is active. The EW can also pass events to the data router queue (if the EWSEQNO parameter of the EWTROPTS initialization statement is used), and the EW subtask can act as an event reader.

Subtask initialization consists of building control blocks for the EW subtask, reading and processing the parameter library member, and opening the event data sets.

Subtask mainline logic provides service for the following events:

- Timer expiration. Process the submit/release data set.
- Subtask stop request. Return to caller.
- Process all events on the EW queue.

Subtask termination closes all open files and returns to the caller.

## Event creation and processing

Figure 8 shows the activities that can cause events to be created and how the events are processed by Tivoli Workload Scheduler for z/OS. The arrows show the flow of events among programs, central storage, and DASD storage. The flow of events is described with reference to the numbering on the diagram.

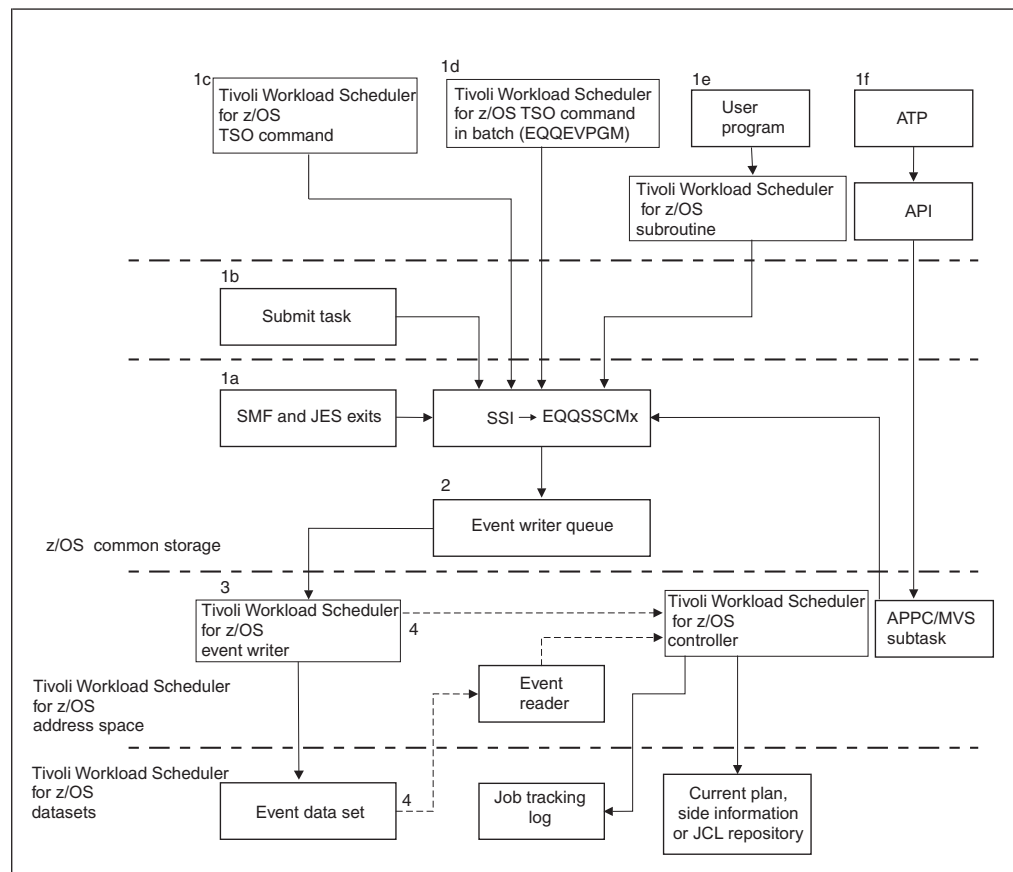


Figure 8. Tivoli Workload Scheduler for z/OS event creation and processing

1. Event information is reported in one of these ways:
  - a. z/OS calls the SMF and JES exits at certain stages in the life of a job. For example, the job initiation exit, IEFUJI, is called whenever a job starts. Tivoli Workload Scheduler for z/OS code in the exits collects relevant information about the event and passes it to the event-creation module, EQQSSCMJ, via the z/OS subsystem interface. Relevant information for a job that has started would include the name and number of the job, its starting date and time, and, if catalog management is active, data set information.
  - b. All Tivoli Workload Scheduler for z/OS address spaces start a submit task. It initiates work on the system that the controller or tracker is started on and that represents the destination defined in the workstation description. When the submit task starts work, it uses EQQSSCMJ to create initialization events, depending on the work to be started. An IJ1 event is created for batch jobs, IJ2 for started tasks, IWTO for write-to-operator (WTO) operations, and IREL for release commands. Submit-checkpointing events (IJ0) are created for all work that Tivoli Workload Scheduler for z/OS submits, except operations that are routed to a user-defined destination ID.
  - c. You provide information about the event as parameters to the BACKUP, OPINFO, OPSTAT, SRSTAT, or WSSTAT command, which is issued from the TSO environment. The parameters are checked and then passed to the event-generation module, EQQSSCMJ, via the z/OS subsystem interface.
  - d. The BACKUP, OPINFO, OPSTAT, SRSTAT, or WSSTAT command is run from a batch job, using the EQQEVPGM event-generating batch program. Parameters, which are input to EQQEVPGM through the SYSIN JCL statement, are checked and then passed to EQQSSCMJ.
  - e. A user program provides information about the event in a parameter list and passes it to the EQQUSIN, EQQUSINB, EQQUSINS, EQQUSINO, EQQUSINW, or EQQUSINT subroutine. The subroutine checks the parameters and passes them to the event-generation module, EQQSSCMJ, via the z/OS subsystem interface.
  - f. An application transaction program (ATP) passes a CREATE request to Tivoli Workload Scheduler for z/OS in an APP buffer through the application programming interface (API). The APPC subtask validates the buffer and then internally invokes the EQQUSIN subroutine.
2. The event-generation module, EQQSSCMJ, uses the information to build an event record and places the record in the event writer queue in ECSA.

**Note:** Except for requests submitted through the API, the processing in these first two steps can take place as soon as the z/OS subsystem interface is started at IPL time. Tivoli Workload Scheduler for z/OS itself need not be active. If the product is not active (in particular, if the event writer subtask is not active), event records remain in the event writer queue until the event writer starts and processes them.

A request submitted through the API must be passed to an active Tivoli Workload Scheduler for z/OS address space where the APPC subtask is started. If an event writer is not started in the same address space, the event must be broadcast.

Event records are generated for *all* z/OS jobs and started tasks, even though they might not be relevant to a particular Tivoli Workload Scheduler for z/OS address space. It is not possible for the programs creating the event records to determine if a particular job is relevant to a particular Tivoli Workload Scheduler for z/OS address space. The event

## Event writer (EW)

creation programs reside in z/OS common storage and do not belong to, or have access to, the data or resources of any Tivoli Workload Scheduler for z/OS address space that might be running on the same system or some other system.

3. The Tivoli Workload Scheduler for z/OS event-writer subtask of the tracker reads event records from the event writer queue and writes them to an event data set.
4. Events are transmitted to the controller by an event reader function. This is performed either by an event reader function of the event writer, or a separate event reader task. An event writer can use an XCF, NCF, or TCP/IP connection to transmit events to the controller. Where a separate event reader is used, the event reader can be active at the controller, or at a tracker that is connected to the controller via XCF, NCF, or TCP/IP. The event manager subtask that is started at the controller processes the events, and the relevant action is then taken by Tivoli Workload Scheduler for z/OS. If the event writer is active but no connection exists to the controller, or if the event reader is not active, events simply stay in the event data set until the required function is available.

Events are never lost, providing that the following two conditions are satisfied:

- The event writer queue in ECSA is large enough to hold all the event records that might be created while the event writer is not active.
- The event data set is large enough to hold all the event records that might be created while a connection to the controller is lost, or an event reader is not active.

**Note:** When Tivoli Workload Scheduler for z/OS is started and the BUILDSSX keyword of OPCOPTS has the value REBUILD, the event-writer queue from the old SSX (subsystem communication-vector-table (CVT) extension) is not referenced in the new SSX. See *Customization and Tuning* for more information about BUILDSSX.

## External router (EX)

The external router (EX) subtask receives submit requests from the data router (DX) subtask when an operation is ready to be started at a computer automatic workstation that specifies a user-defined destination ID. The external router calls the operation-initiation exit, EQQUX009, to handle communications with the user-defined destination.

The EX subtask regularly checks for new requests on the EXA queue. When a new request arrives the EX subtask builds a parameter list and calls EQQUX009. If EQQUX009 abends or is not loaded, the EX subtask creates a workstation offline event for all user-defined destinations. In this case, the status of the operation that corresponds to the request is set according to the SUBFAILACTION keyword of the JTOPTS initialization statement. Subsequent submit request on the EXA queue are discarded and the corresponding operation status is set according to the WSOFFLINE keyword of JTOPTS.

The EXA queue allows for 32000 elements. If the queue becomes full the EX subtask issues a workstation offline event for all user-defined destinations. EQQUX009 must return control to the EX subtask before any subsequent queue elements are processed by the EX subtask. If the return code from EQQUX009 is not 0, the EX subtask sets operation status or generates workstation offline events as specified in the description of the operation-initiation exit in *Customization and Tuning*.

Subtask mainline logic provides service for the following events:

- Subtask stop request. Return to caller.
- Process all requests on the EXA queue and call EQQUX009.
- Generate workstation offline events in response to return code received from EQQUX009.

## General service (GS)

The general service (GS) subtask services a queue of requests from the dialogs, batch command interface tool (BCIT), batch loader (BL), control language (OCL), Dynamic Workload Console, and program interface (PIF) to the Tivoli Workload Scheduler for z/OS subsystem. The first request in the queue is selected and passed to a general-service executor. This process continues while there are requests in the queue. The GS subtask then waits for more work to arrive or for a stop-processing-ECB to be posted.

Input to the GS subtask is:

- A queue element consisting of an identifier of the caller, its ASCB address, and its TCB address (the field SSCID of the subsystem-caller control block). In addition to this ID, the queue element also contains the time stamp of the request.
- The subsystem-caller control block (SSC), which holds a description of the request in the SSCREQ field.

### General-service executor tasks

The general service (GS) executors process the requests that are on the GS queue. The GS task can attach up to five GS executor tasks to prevent service requests from being queued.

## HTTP subtasks

The HTTP tracker connection subtasks (HTC and HTS) connect Tivoli Workload Scheduler for z/OS agents, dynamic domain managers, and remote engines to the controller through an HTTP or HTTPS connection.

The HTC and HTS subtasks run in the controller address space.

### HTTP client task (HTC)

The HTC subtask removes the outbound requests from the HTTPQ queue, which contains requests queued by the data router, received mainly from the workstation analyzer or the general service subtasks. In particular, the HTTPQ queue contains the following request types:

- Job submission, from the workstation analyzer.
- Job log retrieval, from the general service.
- Job cancel, from the general service.
- Bind requests, from the workstation analyzer.

### HTTP server task (HTS)

The HTS subtask listens for inbound requests, using the port number specified in the HTTPOPTS statement.

Some of these requests, for example, the notification of operation status changes, are converted into events and are sent to the event manager through the data router.

### Job completion checker (JCC)

The job completion checker (JCC) subtask provides support for job-specific and general checking of SYSOUT data sets for jobs entering the JES output queues.

The JCC subtask is “triggered” by job and started-subtask termination (3P) events. A 3P event is generated when SYSOUT is spooled. The 3P event then informs the JCC subtask that SYSOUT data sets are available for the current job in the output classes defined for JCC. The JCC subtask then starts to scan all JOBLOG and other SYSOUT data set records and tries to match these records against the message tables defined to the JCC. There are message tables:

- General, for all jobs
- Specific, for the job name.

You can create these message tables by using the EQQJCCT macro. The general message table is mandatory. The JCC subtask searches for job-specific table entries first. If it does not find any, it then searches the entries in the general table.

If a match occurs, an error code can be assigned to the operation (CA=error and EID=0) if you have coded the EQQJCCT macro accurately. This means that the 3P event has been amended with the error code set by the macro. Errors like S222 abends, and JCL errors are reported before 3P events are reported. By specifying the CA and EID, you will override anything reported by earlier events or the current 3P event. Note that a match could occur, but it does not have to be reported as an error to Tivoli Workload Scheduler for z/OS.

If a match does not occur, everything reported by earlier events or the current event (which is 3P) is passed to Tivoli Workload Scheduler for z/OS unaltered. The status for the operation is then updated accordingly.

Subtask initialization consists of:

- Building control blocks for the JCC subtask
- Reading and processing the parameter library member
- Opening the JCC-message-table data set
- Retrieving the general (default) message table member.

Subtask mainline logic provides service for the following events:

- Timer expiration. Retry processing for all delayed jobs.
- Subtask stop request. Return to caller.
- Process all events (3P) on the JCC queue.

### Job-tracking-log archiver (JL)

This subtask, which is part of the controller, asynchronously copies the contents of the inactive job-tracking data set to the JT archive data set. The NM subtask attaches and provides work for the job-tracking-log archiver subtask (for a description of the NM, see “Normal mode manager (NM)” on page 58).

The JT archive data set is defined by DD name EQQJTARC and is used as a repository for JT log records associated with each new current plan. The job-tracking-log archiver (JL) subtask owns the JT archive data set, and will OPEN and CLOSE this data set as required.

To enable the JT log data sets to be reusable, the records must be copied to the JT archive data set. The copy routine is called once for each complete, non-archived JT log. The copy is initiated by a CP backup and is driven by the normal-mode-manager (NM) subtask.



### The archiving process

When the CP backup is complete, the NM subtask calculates the next JT log sequence number, closes the current JT log, and switches to the next JT log. The NM subtask then posts the JL subtask, which will take one of the following actions, depending upon the ECB posted:

- Work ECB is posted. The subtask reopens the old JT log data set, copies (appends) all non-archived JT logs to the JT archive data set, and posts the NM subtask when the copy is complete. The JT log is normally copied to the archive data set before it is needed again as the current JT log data set. The last record appended is the CP backup record.
- Stop ECB is posted. The subtask frees all resources and terminates.

The JT archive data set is copied to the tracklog (EQQTROUT) data set by the daily plan batch programs. The NM subtask empties the JT archive data set when a daily plan batch job has created a new current plan, and NCP takeover is completed successfully.

### Input/output errors

When a write error is found on the current JT log, the log that is in use is switched, and the NM subtask is posted to make a backup. The JL subtask is then posted to copy the JT log that had the output error. If a new output error occurs before the JL subtask has finished copying the first JT log, it is possible that there are no empty JT logs available. In this situation, the NM subtask is posted to stop. To reduce the risk of this occurring, you should always use a minimum of three JT log data sets.

If the dual-logging function is active, Tivoli Workload Scheduler for z/OS duplicates the JT records in the corresponding dual JT log. Dual logs are switched at the same time and in the same sequence as the JT logs. The number of dual JT data sets is determined by the number of normal JT data sets.

JT log sequencing requires that the log that is to be made current has previously been archived. If not, the NM subtask terminates. (Repeated write errors could cause this situation to occur if the JL subtask cannot copy the JT logs as fast as the normal-mode-manager subtask can switch JT logs.)

The subtask terminates if open errors are found on the JT archive data set. Also, the JL subtask terminates if it is unable to copy the JT log to the JT log archive data set because, for example, of an I/O error on the archive data set. If the JT log or archive data set cannot be opened, the subtask terminates. If the subtask terminates abnormally, the JT log data set is not made available for reuse.

Tivoli Workload Scheduler for z/OS automatically recovers from read errors on a JT log during restart. If the error occurs on the first record of the log, the Normal Mode Manager task regards the JT log as empty. A read error on a record other than the first is treated as an end-of-file on the file.

## Network communication function (CB)

The network communication function (CB) subtask supports the transmission of data between the controlling system and controlled systems. This data can be events, JCL, commands, or WTO messages. This subtask provides services for:

- Session establishment
- Session termination
- Subsystem stop
- Queued event-record handling

## Network communication function (CB)

- SEND processing
- RECEIVE processing.

CB subtask initialization consists of:

- Building the internal control blocks (NAB and SCBs)
- Building the VTAM control blocks (ACB, NIB, RPLs, and EXLST)
- Processing initialization parameters
- Building ECB and associated events lists
- Opening the ACB
- Issuing the SETLOGON macro to allow logons.

VTAM exit modules include:

- The LOGON exit
- The VTAM SCIP exit
- Completion exits
- The VTAM LOSTERM exit
- The VTAM TPEND exit
- The VTAM NSEXIT exit.

CB subtask termination consists of closing the ACB.

## Normal mode manager (NM)

The normal mode manager (NM) subtask manages these data sets:

- Current plan and its backups (CP)
- Current plan extension (CX)
- Long-term plan (LTP)
- JCL repository (JS)
- Checkpoint
- Job-tracking log
- Side information (SI)
- Extended data and its backups (XD)

The NM subtask keeps track of which data sets are now *current*. It also controls the CP turnover process.

The NM subtask manages IBM Tivoli Workload Scheduler for z/OS startup processing by using the job-tracking-log data set to update the current plan if IBM Tivoli Workload Scheduler for z/OS has to be restarted from a checkpoint (that is, a data set copy) of the current plan. The Tivoli Workload Scheduler for z/OS checkpoint data set contains status information that is used to reposition Tivoli Workload Scheduler for z/OS sequential data sets when the product is restarted (for example, by the hot standby function) after ending abnormally.

NM performs regular backup and reorganization of the primary JS data set to the alternate JS data set. The frequency of this procedure is determined by the maximum size of the JS data set that you have specified with the MAXJSFILE keyword of the JTOPTS statement. Refer to *Customization and Tuning* for more information about MAXJSFILE. You can schedule or request backups of the JS data set using the BACKUP command. Refer to *Managing the Workload* for details.

Subtask initialization consists of:

- Initializing the checkpoint data set.
- Building control blocks for all job-tracking functions.
- Opening the CP, CX, LTP, XD, job-tracking-log, and side information data sets.

- If required, updating the current plan with the events since the last CP checkpoint. The NM subtask tests the checkpoint data set by reading the first record in the data set. If this record is not valid, the checkpoint data set will be formatted.

Subtask mainline logic consists of providing service for the following events:

- Timer expiration. If required, start the CP turnover process.
- Subtask stop request.
- Post the NM work ECB.

Subtask termination consists of closing all open files.

### Current plan turnover

Refer to the current plan reference information in *Managing the Workload*.

## RODM (RM)

You can use the Resource Object Data Manager to track the status of real resources used by Tivoli Workload Scheduler for z/OS operations. RODM is a data cache that contains information about real resources at your installation. Products such as AOC report actual resource status to RODM; RODM reflects the status by updating values of fields in classes or objects that represent the real resources. Subsystems on the same z/OS image as RODM can subscribe to RODM fields. When RODM updates a field, all subscribers to the field are notified.

Tivoli Workload Scheduler for z/OS support for RODM lets you subscribe to RODM fields for fields in special resources. When RODM notifies a change, Tivoli Workload Scheduler for z/OS updates resource fields that have a subscription to RODM. You can subscribe to RODM for these fields:

- AVAILABLE** The *Available* field in the resource. This value overrides the default and interval values.
- QUANTITY** The *Quantity* field in the resource. This value overrides the default and interval values.
- DEVIATION** The *Deviation* field. You use this field to make a temporary adjustment to quantity. Tivoli Workload Scheduler for z/OS adds quantity and deviation together to decide the amount that operations can allocate. For example, if quantity is 10 and deviation is -3, operations can allocate up to 7 of the resource.

You specify these keywords to invoke monitoring through RODM:

- RODMTASK** Is specified on the OPCOPTS statement for the controller and for each tracker that communicates with a RODM subsystem.
- RODMPARM** Is specified on the OPCOPTS statement for the controller and identifies the member of the parameter library that contains RODMOPTS statements.
- RODMOPTS** Is specified for a controller and contains destination and subscription information.

A RODMOPTS statement is required for each field in every resource that you want to monitor. Each statement is used to subscribe to a field in a RODM class or RODM object for a field in a special resource. The RODM field value is used to set the value of the resource field.

## RODM (RM)

RODMOPTS statements are read when the controller is started. When a tracker that communicates with RODM is started, it requests parameters from the controller. The controller sends subscription information to the tracker, which then subscribes to RODM. An event is created when RODM returns a value, which is used to update the special resource field in the current plan. Tivoli Workload Scheduler for z/OS does not schedule operations that use a special resource until RODM has returned the current field value and Tivoli Workload Scheduler for z/OS has updated the resource.

To use RODM monitoring you must ensure that:

- A tracker is started on the same z/OS image as the RODM subsystem that requests are sent to, and RODMTASK(YES) is specified for both the tracker and the controller.
- An event writer is started in the Tivoli Workload Scheduler for z/OS address space that communicates with RODM. This address space creates resource events (type S) from RODM notifications, which Tivoli Workload Scheduler for z/OS uses to update the current plan.
- The controller is connected to the tracker through XCF, NCF, TCP/IP, or a submit/release data set.
- Each address space has a unique RACF user ID if more than one Tivoli Workload Scheduler for z/OS address space communicates with a RODM subsystem, such as when you start production and test systems that subscribe to the same RODM subsystem.

Tivoli Workload Scheduler for z/OS does not load or maintain data models in the RODM cache, or require a specific data model. You need not write programs or methods to use RODM through Tivoli Workload Scheduler for z/OS, or define specific objects or fields in RODM. Tivoli Workload Scheduler for z/OS does not update RODM-defined data.

RODM fields have several subfields. The RODM field that Tivoli Workload Scheduler for z/OS subscribes to must have a *notify* subfield. Through a subscription to this subfield, RODM notifies the product of changes to the *value* subfield. Tivoli Workload Scheduler for z/OS uses changes to the value subfield to monitor special resources. But only these data types are valid for Tivoli Workload Scheduler for z/OS RODM support:

Table 4. Valid RODM data types for value subfields

Abstract data type	Data type ID
CharVar (Char)	4
Integer (Bin 31)	10
Smallint (Bin 15)	21

Tivoli Workload Scheduler for z/OS maintains a RODM status for all special resources in the current plan. You can check the current status in the SPECIAL RESOURCE MONITOR dialog. Each special resource has one of these values:

- N** Not monitored. The special resource is not monitored through RODM.
- I** Inactive. Monitoring is not currently active. Tivoli Workload Scheduler for z/OS sets this status for all subscriptions to a RODM subsystem that the controller cannot communicate with. This can occur when communication is lost with RODM or with the tracker. The controller sets the value of each monitored field according to the RODMLOST keyword of RODMOPTS.

- P** Pending. Tivoli Workload Scheduler for z/OS has sent a subscription request to RODM, but RODM has not returned a value.
- A** Active. Tivoli Workload Scheduler for z/OS has received a value from RODM and the special resource field has been updated.

RODM support is implemented using the RODM USER API. Tivoli Workload Scheduler for z/OS loads RODM interface module EKGUAPI, which must be accessible via LINKLST or STEPLIB.

The RODM subtask is attached by the subsystem task. The subtask creates a new queue (RODQ) and a table with 1 entry for each active subscription. The table also contains 1 system entry for each connected RODM subsystem. Each subscription entry contains data received from RODM for the subscription and parameter list areas, including the ECB, used for all asynchronous requests.

RODM and Tivoli Workload Scheduler for z/OS interface in this way:

- The queue server contains a *work-to-do* loop, which waits on an ECB list. Initially, this ECB list contains a stop ECB and a queue ECB. The RODM subtask connects and disconnects RODM.
- Inbound subscription messages are placed on the RODM queue (RODQ) by the Tivoli Workload Scheduler for z/OS subsystem task. When a message is detected on the queue, a new subscription entry is added to the table. For the first subscription request to a RODM subsystem, a system entry is also created in the table and a system ECB and a RODM-stop ECB are added to the ECB list.
- A query is issued to the RODM subsystem. The current value is translated and then passed to the writer queue (WTRQ).
- A subscribe is performed and the program goes into WAIT on the ECB list.
- When the subscribe ECB is posted by RODM, the RODM subtask retrieves information from the subscription queue and builds a resource event, which it puts on the WTRQ. All other entries in the table are checked for posted ECBs and the program then returns to a WAIT state.
- The event manager analyzes the incoming resource event and updates the special resource field.

This processing continues until the subtask is stopped or the RODM subsystem ends. If RODM ends, entries in the table are reset. The entries are reprocessed when RODM returns. If the RODM subtask ends, requests outstanding are processed when the subtask is restarted. If Tivoli Workload Scheduler for z/OS is stopped, all subscriptions are deleted.

## Submit (SU)

The submit (SU) subtask initiates these functions: job submit, job release, started-subtask initiation, and WLM job promotion. When the submit subtask receives a request, for example, to submit a job, it checkpoints the submit sequence-number, loads the corresponding JCL in a storage buffer, and submits this to the internal reader. If the submit is successful, a submit event (type IJ1, IJ2, IJ3, IWTO, IREL, or IWLM) is built, and a subsystem request is issued to broadcast the event-creation routine. If there is no more work for the submit subtask to process, a WAIT is entered.

## Submit (SU)

The submitter task is part of the tracker, but job submission is initiated by the workstation analyzer (WA) task of the controller. Checkpointing of submission requests is the means by which the two tasks cooperate to ensure that all requests for submission are honored.

When the connection between the controller and a tracker is initially established, and subsequently each time the connection is reestablished after some disruption, the controller requests synchronization. A synch request is sent for each workstation defined with a destination of the particular tracker to synchronize submit requests, as some requests might have been lost because of a bad connection or tracker outage. The tracker responds to the request by issuing a synchronization response event, which is written to the event data and communicated to the controller in the same way as other job-tracking events. The event is prefixed IJ0 (see Chapter 5, "Data areas," on page 73 for control block mapping) and contains checkpoint information that describes the number of submit events processed by the tracker. When the controller reads the synchronization response event, a check is made to determine the number of submit requests that should have been processed by the tracker. If there is a discrepancy, the controller resends the submit request.

Operations that have been rerouted to an alternate workstation will not be resubmitted.

If the tracker, during normal processing, receives a submit request out of order, the request is discarded, and an out-of-sequence synchronization event is created. Upon receipt of this event, the controller immediately suspends job submission for new operations and resends all requests for the reportedly lost job submission request and all following requests. The lost submit-event record is also prefixed IJ0.

### Releasing a job on a JES2 system

On a JES2 system, the Tivoli Workload Scheduler for z/OS release routine does the following:

- If the job is a local job, sends a status request to JES2 to verify that the job is known to, and held by, JES2
- If the job is a local job, builds a release command in the following format:  
\$AJnnnnn (nnnn is job number)
- If the job is a remote job, builds a release command in the following format:  
\$G A node,'jobname',Jnnnnn,0=orgnode
- Sends the release command to JES2 using SVC 34.

### Releasing a job on a JES3 system

On a JES3 system, the Tivoli Workload Scheduler for z/OS release routine does the following:

- If the job is a local job, sends a status request to JES3 to verify that the job is known to, and held by, JES3
- If the job is a local job, builds a release command in the following format:  
\*F J=nnnn,R (nnnn is job number)
- If the job is a remote job, builds a release command in the following format:  
\*T node \*F J=rnnn,R (rnnn is remote job number)
- Sends the release command to global JES3, using IATSSCM1.

On JES3 Version 2 Release 2 (or later) systems, the command is sent to JES3 using SVC 34.

Note that the remote release command assumes that the remote system is a JES3 system.

## TCP/IP tracker connection (IP)

The TCP/IP tracker connection (IP) subtask connects standard z/OS tracker to the z/OS controller through the Transmission Control Protocol/Internet Protocol (TCP/IP). This task enables IPV6 and IPV4 standards, and SSL authentication and encryption.

The IP task has a queue in the controller and tracker named TIPQ, where the Data Router (DX) task tails the events that will be managed by the task.

The IP task runs on the controller and tracker.

### IP task on controller side

On the controller, the IP task opens a main socket where it receives the connection requests from the trackers. The IP task is always waiting for an event; iteration is done if the task receives an event.

The main events that the IP task can receive are:

- There is work on the TIPQ.
- There is a connection request from a tracker (connect() from tracker).
- There are bytes to be read on a socket (write() from tracker).
- Bytes are to be written on a socket (write() to tracker).
- A started task stop request must be processed.
- The loop timeout has expired.
- Task abnormal end.

When the IP task receives an event, it starts iterating and checks:

1. Whether the loop timeout has expired or an abnormal end occurred.
2. The reading sockets to verify if:
  - There is a connection request from a tracker on the task main socket.  
The task checks that the IP address or host name and the port number match with the IP addresses, host names, and port numbers specified in the initialization parameters. If any value is not valid or already in use, the connection requested is not established.
  - There are bytes to be received from trackers  
If there are, they are received by the controller.
3. The task queue. If there is work on the TIPQ, the IP task stores the entries in another internal queue of the task for later processing.
4. The write sockets to verify if there is a connection() or write() request pending for the remote tracker that must be processed. The request result is checked.
5. Whether there are entries in the internal queue. If there are, the IP task processes the DQE and sends the data to the remote trackers.

### IP task on tracker side

The IP task on the tracker decides to connect to the controller. The controller is always waiting for the connection request passively. The tracker must always be connected to the controller. If the connection goes down, the tracker tries to establish it again until it succeeds or the tracker is stopped; the error message handling at tracker side is the following:

## TCP/IP tracker connection (IP)

- The error messages display is enabled at initialization time.
- The error messages display is disabled after a TCP/IP connection problem (EQQIP15E or EQQIP17I are issued in the message log), so that the following connection retries will not issue error messages.
- The error messages display is re-enabled when a connection is successful; an informational message informing about the restored connection is issued (EQQIP12I).

The IP task is always waiting for an event; iteration is done if the task receives an event.

The main events that the IP task can receive are:

- There is work on the TIPQ.
- There are bytes to be read on a socket (write() from controller).
- Bytes are to be written on a socket (write() to controller).
- A started task stop request must be processed.
- The loop timeout has expired.
- Task abnormal end.

When the IP task receives an event, it starts iterating and checks:

1. Whether the loop timeout has expired or an abnormal end occurred.
2. The reading sockets. If there are bytes to be received from controller, the IP task receives the bytes.  
If some buffer received is completed, the received information is checked: if this is a DQE from the controller, the task enqueues the information on the data router queue (RTRQ). If the connection to the controller is not established, the tracker tries to connect even if the loop timeout has expired.
3. The task queue. If there is work on the TIPQ, the IP task stores the entries in another internal queue of the task for later processing.
4. The write sockets to verify if there is a connection() or write() request pending for the controller that must be processed. The request result is checked.
5. Whether there are entries in the internal queue. If there are, the IP task processes the DQE and sends the data to the remote trackers.

## Workstation analyzer (WA)

The workstation analyzer (WA) subtask analyzes operations (jobs, started tasks, and WTO messages) that are ready to start at:

- Automatically reporting computer workstations
- Nonreporting workstations
- General workstations that have the WTO option specified.

For each active workstation that is defined in the CP, the WA sends a synchronization request, to the related submit task. The submit checkpoint mechanism is described in detail on page “Submit (SU)” on page 61. The workstation analyzer identifies the most urgent operation to be submitted from a list of ready operations. When an operation is selected, the JCL for the operation must be retrieved. The WA searches for the JCL in the following order:

- The JCL repository
- A data set indicated by the EQQUX002 exit, if the exit is present
- The Tivoli Workload Scheduler for z/OS job library (EQQJBLIB).

Variable substitution is performed for the JCL if required, and the job input is imaged to the JCL repository. The EQQUX001 is called if present. A submit request,



which includes the JCL and specified destination, is queued to the data router (DX) task. The workstation analyzer updates the current plan and creates a job-tracking record TRL25 to record the submit request. The operation status is changed to SU to indicate that submission is in progress.

Variable substitution is performed for the System Automation command text if required, and the result is also saved as CPLREC33. The EQUXSAZ is called, if present. A submit request, which includes the System Automation command and specified destination, is queued to the data router (DX) task. The workstation analyzer updates the current plan and creates a tracking record to track the submit request. The operation status is changed to SU, to indicate that submission is in progress.

The WA subtask also processes any workstation operation that has a deadline WTO message specified. Operations with a deadline WTO message that have reached their latest start times are always selected first. This process continues while there are operations that can be started. The workstation analyzer subtask then waits for more work to arrive or for the next scheduled event to occur. The WA resends submit requests for operations that are flagged as having lost their submit requests.

If you specify the LATEOPER or DURATION keywords on the ALERT initialization statement, the WA is responsible for issuing the relevant alert when the condition is detected.

If you specify the WLM initialization statement, the WA regularly checks if an operation has reached particular time limits that activate the policy. These limits are specified either by default, in the WLM initialization statement and valid for all critical operations or by you, in the Modify Current Plan or the Application Description environment and valid only for the particular operation. In these instances, the WA sends a request to the related submit task for WLM promotion.

**Note:** On fault-tolerant workstations, the WA subtask manages only non-centralized scripts that have some dependencies on special resources or centralized scripts. Non-centralized scripts without any dependencies on special resources are managed by the batchman process of the fault-tolerant workstations on which the job is scheduled.

**Note:** If the Workstation Analyzer subtask has no operations to schedule, it is woken up every two minutes so that message EQQE038I can be issued with two minutes of delay.

### When an operation is eligible to be started

An operation can be started when:

- The workstation is active (that is, the controller can communicate with it), is open, and has an available parallel server (or the WA has been requested not to use parallel servers in scheduling decisions). For jobs on a fault-tolerant workstation, the workstation must be linked active, CPULIMIT must be nonzero, and the jobs running on the workstation must be fewer than the CPULIMIT set.
- The status of the operation is either ready or arrived, and the manual hold (MH) CP function has not been specified.
- The manual release (MR) CP function has been specified, following a manual hold (MH) request for the operation.
- The duration of the operation is such that the operation can be processed during the time that its associated workstation remains open. This is dependent on what has been specified in the shutdown policy defined in the SHUTDOWN parameter of the JTOPTS initialization statement. Refer to *Customization and Tuning*.
- Either the operation does not use any special resources, or it uses special resources that are available and that can satisfy the allocation criteria.

The operation specifies a quantity and type for each allocation. Quantity is a number from 1 to 999999, or blank. Blank means the current maximum quantity of the special resource. The type is either shared (other operations can share the allocation concurrently) or exclusive (the operation must be the only user of the allocated quantity).

If an operation needs a special resource that is not defined in the current plan, Tivoli Workload Scheduler for z/OS uses the DYNAMICADD keyword of the RESOPTS statement to determine if it creates the required special resource dynamically.

- Job submission has not been prevented for this operation.
- The execute (EX) CP function has been requested for this operation.
- There have been no errors during a previous attempt to start this operation.
- This is either a normal (non-time-dependent) operation, or it is a time job that can be started now.

A time job is an operation on a computer workstation that should start at a particular time, as opposed to the normal Tivoli Workload Scheduler for z/OS situation where an operation is started when all its predecessors are complete.

A time job can have the cancel-if-late attribute. If so, it might not be started after its start time has passed, depending on the SUPPRESSPOLICY parameter specified for the Tivoli Workload Scheduler for z/OS system in the JTOPTS initialization statement. Refer to *Customization and Tuning*.

- Either the operation does not use any workstation resources, or it does not use more workstation resources than are available.

A workstation resource is related to a specific workstation. For example, you can specify that one workstation has 2 optical readers and 10 tape units. Operations that need tapes or optical readers should then be defined so that Tivoli Workload Scheduler for z/OS knows how many are needed to start the operation. If this is done, operations do not start (by the WA) on this workstation unless there are enough tapes and optical readers available.

### Operation priority

If there is more than one operation that can be started, the WA scheduler selects an operation by investigating these characteristics in the stated order:

1. Priority 9.

2. Earlier latest-start time.

The latest-start time is calculated internally by Tivoli Workload Scheduler for z/OS, and is the latest time (based on the operation duration) that the operation must start if it is to be completed before its deadline. If no deadline is specified for the operation, Tivoli Workload Scheduler for z/OS uses the occurrence deadline and subtracts the duration for each successor operation on the critical path.

3. Priority 8–1.

4. Shortest estimated duration.

5. First-in first-out basis.

### Retrieving JCL

The WA retrieves JCL for the job that is ready to be started and sends it to a submit subtask via the data router (DX) subtask. The WA extracts the JCL for the job from:

- The JS data set, if the JCL to be used is saved there.
- The data set indicated by the EQQUX002 job-library-read exit, if the exit is requested by the EXITS initialization statement.
- The Tivoli Workload Scheduler for z/OS job library (EQQJBLIB).
- The EQQUX001 job-submit exit, if requested.
- A user-defined JCL imbed exit, or EQQJBLIB, if the FETCH directive is included in the `//*%0PC JCL` statement.

Operations handled by the external router (EX) subtask are not required to have JCL fetched by the controller, instead the JCL may be fetched by the operation-initiation exit, EQQUX009, or located at the receiving user-defined destination. If JCL can be located by the controller it will be processed and passed to the EX task, and subsequently to EQQUX009, as normal.

The values for any JCL variables that are present in the JCL are retrieved from JCL variable tables or from a user-defined JCL-variable-substitution exit. When the job is found, the JCL is retrieved and, if necessary, a new JS record is built.

When a JCL directive statement is actioned, it is changed by Tivoli Workload Scheduler for z/OS to a JCL comment statement. JCL directive statements are defined in the job input as z/OS JCL statements. The statement is changed when the operation is submitted to a valid comment statement for the target operating system. The image of the job input in the JCL repository is not altered.

Subtask initialization consists of building the WA environment and opening all required files.

Subtask mainline logic consists of providing service for the following events:

- Timer expiration. Trying to find an operation to be started.
- Post the work ECB. Trying to find an operation to be started.
- Subtask stop request.

Subtask termination consists of closing all open files.

### Data store network common function (FN)

This is the task that handles the SNA communication between the controller and Data Store (the XCF Connection is handled by the FL task). Its internal logic is similar to the NCF task.

## Data store network common function (FN)

### Data store TCP/IP communication task (ID)

This is the task that handles the TCP/IP communication between the controller and Data Store. Its internal logic is similar to the IP task.

### Fetch joblog (FL)

This task is in charge of the Joblog Retrieval and Restart and Clean up functions. It communicates with the Data Store address space to get joblog (Joblog Retrieval) and structured joblog data information (Restart and Clean up).

It is also in charge of starting the local data store used for storing the oper\_info structures.

The task is queue-driven. The queues are:

**ARCQ**            SSX queue used for controller/FL communication.

**ANCQ**            Internal queue used for data store/FL communication.

Controller requests to FL are sent via DQE of type "ARC":

**Type=LOG**      Get z/OS joblog

**Type=OPI**      Ask Oper\_info structure

**Type=SDEL**     Start deletion of old entries in local data store

### Pre-submitter task (PSU)

This task is in charge of the JCL tailoring needed to implement the Restart and Cleanup function. It adds the EQQCLEAN pre-step to the JCL in order to:

1. Execute a step restart.
2. Execute a clean up.

PSU interacts with the following other tasks:

- GS
- WSA
- FL
- SU

The task is queue-driven. Its SSX queue is the PSUQ.

Requests to PSU are sent via DQE of type "PSU":

**Type=APL**      Apply logic: tailor JCL to do clean up and/or step restart

**Type=CLN**      Stand-alone clean up: create a new job to execute clean up

---

## Tivoli Workload Scheduler for z/OS data store subtasks

### Writer

This triggers the reading process for the SYSOUT data, and stores it in the database. More than one Writer task can be active at the same time, to allow parallel operations of SYSOUT data analysis.

## Reader

This looks for SYSOUT data in the database and transmits it to the requesting Controller. Every time the Controller asks the Communication subtask for a SYSOUT, The Communication subtask activates the reader. If the Reader does not find the SYSOUT in the Database, then the JES Queue reader is activated.

## JesQueue

This triggers the reading process of the job IDs found in the spool classes reserved for the Data Store, and then stores the same IDs in a queue, so allowing the synchronization of the different requests for the active Writer subtasks.

## Communication

This performs the following main functions:

- Links the Tivoli Workload Scheduler for z/OS controller by SNA or XCF connection type, depending on the startup parameters
- Receives job SYSOUT requests from the Tivoli Workload Scheduler for z/OS dialog and forwards them to the Data Store reader component
- Sends the data requested by the Controller.

## Command

This is the interface between the operator and the Data Store. The Command subtask manages all the external Data Store commands.

## Cleanup

This component manages the deletion of SYSOUTs from the database, according to the selection criteria specified in the parameters member whose name corresponds to the CLNPARM parameter in the DSTOPTS initialization statements.

---

## User exit and task relationships

Table 5 and Table 6 show the subsystems in which each user exit of Tivoli Workload Scheduler for z/OS is run. Table 5 lists the user exits and assigns them a key heading that you can match in Table 6 to find the corresponding subsystem and task.

*Table 5. User exits in Tivoli Workload Scheduler for z/OS*

Exit Name	Exit Type	Heading in Table 6
EQQUX000	Start/Stop	0
EQQUX001	Job-Submit	1
EQQUX002	Job-Library-Read	2
EQQUX003	Application-Description-Feedback	3
EQQUX004	Event-Filtering	4
EQQUX005	SYSOUT Archiving	5
EQQUX006	Incident-Record-Create	6
EQQUX007	Operation-Status-Change	7
EQQUX009	Operation-Initiation	9
EQQUX011	Job-Tracking Log Write	11
EQQUX013	Job-Tailoring Prevention	1

## User exit and task relationships

Table 5. User exits in Tivoli Workload Scheduler for z/OS (continued)

Exit Name	Exit Type	Heading in Table 6
EQQUXPIF	Application-Description-Validation	AV
EQQUXSAZ	System Automation command	SAZ
User defined	JCL-Imbed (FETCH Directive)	JCL
User defined	JCL-Variable-Substitution	JVAR
User defined	Automatic-Job-Recovery	AR
User defined	Daily-Planning-Report	DP

Table 6 shows whether each exit is executed in the Controller, the Tracker, or in a batch program. Tracker exits are run also in the Controller if the Controller has an Event Writer task; that is, if EWTRTASK(YES) is specified in OPCOPTS.

Table 6. User exit and task relationships

Subsystem	Task	0	1	2	3	4	5	6	7	9	11	JCL	JVAR	AR	DP	AV	SAZ
All	System Task Dispatcher	X															
Controller	Automatic Recovery				S				S		S			S			
Controller	Event Manager				S				S		S						
Controller	External Router									X							
Controller	General Service			S	S				S		S	S	S				
Controller	Normal Mode Manager				S				S		S						
Controller	Workstation Analyzer		S	S	S				S		S	S	S				S
Trackers/ Controller	Event Writer					X											
Trackers/ Controller	Job Completion Checker						X	X									
Batch	Daily Planning														X		
PIF	AD Validation															X	

### Notes®:

1. The S mark means that the execution in the part of the task where the exit is run is subject to serialization. The X mark implies that there is no serialization.
2. When a task operates on a resource, it holds it exclusively. Normally the resource is the current plan. While the task is updating the current plan, no other task can reference the current plan at the same time.
3. An exit should avoid processing, such as I/O operations, that may result in system waits and must not perform requests to the Tivoli Workload Scheduler for z/OS program interface.

4. Termination of the Job Completion Checker exits (EQQUX005 and EQQUX006) precludes the ending of the connected job.

## User exit and task relationships



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## Chapter 5. Data areas

This chapter provides graphic representation of many data areas used by Tivoli Workload Scheduler for z/OS. This publication attempts to provide the information that is most often needed, not all data areas are documented here. In general, any of the following specifications were considered to qualify a data area for inclusion in this publication:

- The data area is a physical record mapping
- The data area is used extensively in debugging

Data areas appear alphabetically, by name of the mapping macro. The data areas in this publication are not intended to be used as a customer user interface. The areas are product sensitive and can be changed at any time during the current release without documentation updates to this publication.

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### The data area map

The data area is described field by field. These field descriptions are taken directly from the system code.

For each field in the data area, the table provides the following information:

<b>Offsets</b>	The address of the field, shown in both decimal and hexadecimal (hexadecimal address in parentheses), relative to the beginning of the data area.
<b>Type</b>	The kind of program data defined for this field, such as CHARACTER, SIGNED, UNSIGNED.
<b>Len</b>	Size of the field in bytes (decimal).
<b>Name</b>	The name of the field, bit, or mask.  Bit or mask names are preceded by a description of the bit position and values, as follows: 1... .... Refers to bit 0. .... ..11 Refers to bits 6 and 7. ...1 .... Refers to bit 3. 11.. 1111 Refers to bits 0, 1, 4, 5, 6, and 7.
<b>Description</b>	A description of the purpose or meaning of the field, bit, or mask.

---

### The cross-reference table

For each data area with more than 40 fields, a cross-reference table shows the following:

- *Hex Offset*: The hexadecimal offset of the field into the data area (for bits, the hexadecimal offset of the field containing the bit).
- *Hex Value*: Hex values are shown only for bits. The Hex value shown implies the position of the bit in the field containing the bit. For an example illustrating how to use the Hex Value, see the bit DOACMD\_FAIL in the DOA data area.

In the DOA data area, the cross-reference table for the DOACMD\_FAIL bit looks like this:

## Cross-reference table

Name	Hex Offset	Hex Value	Level
DOACMD_FAIL	8F	80	3

In the mapping of the DOA, the DOACMD\_FAIL bit appears like this:

143	(8F)	BITSTRING	1	DOAFLAG3	FLAG BYTE
				DOACMD_FAIL	OP COMMAND FAIL FLAG

Hex Offset 8F is the offset of field DOAFLAG3, a 1-byte field. The first bit in this field is named DOACMD\_FAIL. Ignoring the other bits in the field DOAFLAG3, if the DOACMD\_FAIL bit is on, the value of field DOAFLAG3 would be 1000 0000, which is equivalent to hex 80. This value (hex 80) is shown in the Hex Value column of the cross-reference table. When a bit is on, the condition described in the Description field of the mapping is true.

## Date formats used in Tivoli Workload Scheduler for z/OS

Different components of Tivoli Workload Scheduler for z/OS use different formats to represent dates. Table 7 describes how these formats are used.

Table 7. Date formats used in Tivoli Workload Scheduler for z/OS

IBM Tivoli Workload Scheduler for z/OS component	Date format	Length	Date type
Controller	YYMMDD	6	Internal date
	0nYYDDDF	4	Time stamp
Trackers	YYMMDD	6	Real date
	0nYYDDDF	4	Time stamp
Description databases	YYMMDD	6	Internal date
Batch loader and SYSIN for batch programs	YYMMDD	6	Real date
Dialogs and reports	Defined by the user, for example YY/MM/DD	8	Real date
Exits	YYMMDD	6	Real date
	0nYYDDDF	4	Time stamp
Programming interfaces	YYMMDD	6	Defined by the user

### Notes:

1. Real date means that 1 January 1998 is represented as 980101.
2. For the internal date, Tivoli Workload Scheduler for z/OS uses 1972 as the base year for the century window. This means that the year 1972 is represented as 00 and 2071 is represented as 99.
3. The z/OS time stamp uses 00YYDDDF for dates in the 20th century, and 01YYDDDF for dates in the 21st century.
4. The date format of the programming interfaces depends on the base year of the PIF century window defined by the PIFCWB keyword of the INTFOPTS statement, or the CWBASE keyword of the INIT statement. 00 implies real dates. 72 corresponds to Tivoli Workload Scheduler for z/OS's internal date format.

## ADR - application description

Name : DCLADR

Function:

This segment declares an application or job description in the application description database (EQQADDS)

The AD record is structured as follows:

- 1 adr
  - 2 common data
  - 2 run cycles ( )
    - 3 number of positive offsets ( )
    - 3 number of negative offsets ( )
    - 3 rule ( )
  - 2 operations ( )
    - 3 internal predecessors ( )
    - 3 external predecessors ( )
    - 3 special resources ( )
    - 3 extended name ( )
    - 3 system automation info ( )
    - 3 condition information( )
    - 3 condition dependency( )

The following structures and pointers are defined:

- adr based(adrptr)
- adrrun based(runptr)
- adrop based(opptr)
- adropint internal predecessors section
- adropext based(extptr) external pred. section
- adropsrs resource section
- adrop\_extinfo section
- adrop\_autoinfo section
- adrop\_cond\_info
- adrop\_cond\_simple

Offsets to first run cycle and first operation are saved in the fixed part of the record. Run cycles and operations are chained together by offsets from beginning of each segment.

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	ADR	
0	(0)	CHARACTER	208	ADRCOMMON	
0	(0)	CHARACTER	2	*	USED BY I/O ROUTINES
2	(2)	CHARACTER	23	ADRKEY	KEY OF THE RECORD
2	(2)	CHARACTER	16	ADRID	APPLICATION ID
18	(12)	CHARACTER	1	ADRSTAT	STATUS AND TYPE
19	(13)	CHARACTER	6	ADRTO	VALID TO
25	(19)	CHARACTER	4	ADREYE	EYE CATCHER
29	(1D)	UNSIGNED	1	ADRVERS	VERSION NUMBER

## ADR - application description

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
30	(1E)	CHARACTER	6	ADRFROM	VALID FROM
36	(24)	CHARACTER	24	ADRDESCR	DESCRIPTIVE TEXT
60	(3C)	CHARACTER	8	ADRGROUP	AUTHORITY GROUP NAME
68	(44)	CHARACTER	16	ADROWNER	OWNER ID
84	(54)	CHARACTER	24	ADRODESC	OWNER DESCRIPTION
108	(6C)	CHARACTER	1	*	SPARE
109	(6D)	CHARACTER	6	ADRLDATE	LAST UPDATE DATE
115	(73)	CHARACTER	4	ADRLTIME	LAST UPDATE TIME
119	(77)	CHARACTER	8	ADRLUSER	LASTUPDATE USER-ID
127	(7F)	CHARACTER	1	ADRPRIOR	PRIORITY
128	(80)	CHARACTER	3	ADRDSM	DEADLINE SMOOTHING FACTOR
131	(83)	CHARACTER	3	ADRDLIM	DEADLINE FEEDBACK LIMIT
134	(86)	SIGNED	2	ADROP#	TOTAL NUMBER OF OPERATIONS
136	(88)	SIGNED	4	ADRRUN#	TOTAL NUMBER OF RUN CYCLES
140	(8C)	SIGNED	4	ADRFRUN	OFFSET TO FIRST RUNCYCLE
144	(90)	SIGNED	4	ADRFOP	OFFSET TO FIRST OP
148	(94)	CHARACTER	1	ADRFLAGS	AD FLAGS
				ADRERD	DEADLINE CANNOT BE MET
				ADRJOB	APPLICATION IS JOB DESCRIPTION COMPLIANT
				ADRMON	1: ANY MONITORED JOB IN APPLICATION
		...1 ....		ADRCALDEF	WORK BIT
				*	FREE
149	(95)	CHARACTER	16	ADRCAL	CALENDAR IDENTITY
165	(A5)	CHARACTER	16	ADRGROUPID	GROUP APPLICATION
181	(B5)	CHARACTER	19	*	FREE
200	(C8)	CHARACTER	8	ADRLUTS	LAST UPDATE TIMESTAMP
208	(D0)	CHARACTER	*	ADRVARSECT	VARIABLE LENGTH SECTION

## Run cycle segment

The value of ADDRUN# in the common data segment describes the number of run cycle segments that follow the common data.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	120	ADDRUN	
0	(0)	SIGNED	4	ADRRNRUN	OFFSET TO NEXT RUNCYCLE REL TO BEGINNING OF ADR
4	(4)	SIGNED	2	ADRR	RUN CYCLE NUMBER
6	(6)	CHARACTER	8	ADRRPER	PERIOD NAME, RULE NAME
14	(E)	SIGNED	2	ADRRNPOS	NUMBER OF POS OFFSETS
16	(10)	SIGNED	2	ADRRNNEG	NUMBER OF NEG OFFSETS
18	(12)	UNSIGNED	1	ADRRULE	FREE DAY RULE
19	(13)	CHARACTER	6	ADRRFROM	RUN CYCLE VALID FROM
25	(19)	CHARACTER	6	ADRRROUT	RUN CYCLE NOT VALID FROM
31	(1F)	CHARACTER	50	ADRRDESC	RUN CYCLE DESCRIPTION
81	(51)	CHARACTER	1	ADRRRTYPE	RUN CYCLE TYPE SEE RC TYPE CONSTANTS
82	(52)	CHARACTER	4	ADRRARRI	INPUT ARRIVAL TIME
86	(56)	CHARACTER	6	ADRRDEAD	DEADLINE
86	(56)	CHARACTER	2	ADRRDAY	DEADLINE DAY REL. TO START
88	(58)	CHARACTER	4	ADRRRTIME	DEADLINE TIME
92	(5C)	CHARACTER	16	ADRRJVT	JCL VAR TABLE NAME
108	(6C)	SIGNED	2	ADRRRDLEN	RULE DEFINITION LENGTH
110	(6E)	CHARACTER	4	ADRRREYRR	EVERY REPEAT RANGE
114	(72)	CHARACTER	4	ADRRREYET	EVERY END TIME
118	(76)	CHARACTER	2	*	FREE
120	(78)	CHARACTER		ADRRRUNEND	END OF RUN CYCLE DEF

## ADR - application description

### Positive offset sub-segments

The value of ADRRNPOS in the run cycle segment describes the number of positive offset sub-segments of the run cycle segment.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	ADRRDAYPOS	POSITIVE RUN DAYS
0	(0)	CHARACTER	3	ADRRDAYP (*)	RUN DAY OFFSETS

### Negative offset sub-segments

The value of ADRRNNEG in the run cycle segment describes the number of negative offset sub-segments of the run cycle segment.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	ADRRDAYNEG	NEGATIVE RUN DAYS
0	(0)	CHARACTER	3	ADRRDAYN(*)	RUN DAY OFFSETS

### Rule definition subsegment

You can have the rule definition sub-segment in the run cycle segment only if ADRRRDLEN is greater than 0 in the run cycle segment.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	ADRRRDEFSEG	RULE DEFINITION SEGMENT FOLLOWS THE VARIABLE NUMBER OF POSITIVE AND NEGATIVE OFFSETS
0	(0)	CHARACTER	*	ADRRRDEF	RULE DEFINITION VALUE

The rule definition sub-segment is mapped to the following structures:  
DCLRULEV COMMON DATA:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	58	RVAL	RULE VALUE
0	(0)	SIGNED	4	RVAL_LENGTH	LENGTH OF SELF
4	(4)	CHARACTER	10	RVAL_TIMESTAMP	TIME STAMP
4	(4)	CHARACTER	6	RVAL_TS_DATE	AID DATE
10	(A)	CHARACTER	4	RVAL_TS_TIME	TIME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
14	(E)	CHARACTER	10	*	
24	(18)	ADDRESS	4	RVAL_FORWOP	OFFSET/PTR TO FIRST FACTOR
28	(1C)	ADDRESS	4	RVAL_LASTOP	OFFSET/PTR TO FIRST LAST
32	(20)	ADDRESS	4	RVAL_CYCLEOP	OFFSET/PTR TO FIRST CYCLE DESC
36	(24)	SIGNED	4	RVAL_ESTIMATE	ESTIMATED NUMBER OF DATES/YEAR
40	(28)	CHARACTER	8	RVAL_FACTOR	FACTOR SPECIFICATION
40	(28)	BITSTRING	1	RVAL_FREQ	FREQUENCY
				RVAL_EVERY	EVERY
				RVAL_ONLY	ONLY
				*	NOT USED
				RVAL_DEFAULT	DEFAULT FIRST USED
41	(29)	CHARACTER	1	*	NOT USED
42	(2A)	SIGNED	2	RVAL_ORIGSHIFT	ORIGIN SHIFT OR 0
44	(2C)	SIGNED	2	RVAL_FORWNUM	NUMBER OF FORWARD FACTORS
46	(2E)	SIGNED	2	RVAL_LASTNUM	NUMBER OF BACKWARD FACTORS
48	(30)	CHARACTER	8	RVAL_DAYSPEC	DAY SPECIFICATION
48	(30)	BITSTRING	1	RVAL_DAYTYPE	TYPE OF DAY SELECTED
				RVAL_ALLDAYS	DAY
				RVAL_WORKDAYS	WORKDAY
				RVAL_FREEDAYS	FREEDAY
				RVAL_WEEKDAYS	WEEKDAY
				*	
49	(31)	CHARACTER	1	RVAL_WEEKDAY(7)	ONE OR MORE WEEKDAYS
56	(38)	SIGNED	2	RVAL_CYCLENUM	NUMBER OF CYCLE SPECIFICATIONS

DCLRULEV VARIABLES:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	RVAL_FORW	ARRAY OF NUMERIC FACTORS

## ADR - application description

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	SIGNED	2	RVAL_FORWFAC(*)	NUMERIC FACTOR - FORWARD
0	(0)	STRUCTURE	*	RVAL_LAST	ARRAY OF NUMERIC FACTORS
0	(0)	SIGNED	2	RVAL_LASTFAC(*)	NUMERIC FACTOR - BACKWARD
0	(0)	STRUCTURE	*	RVAL_CYCLE	ARRAY OF CYCLE SPECS
0	(0)	CHARACTER	36	RVAL_CYCLESPEC(*)	CYCLE SPECIFICATION
0	(0)	CHARACTER	8	RVAL_CYCLENAME	NAME
8	(8)	BITSTRING	2	RVAL_CYCLETYPE	TYPE
				RVAL_PREDEF	OPC PREDEFINED
				RVAL_USER	USER DEFINED
				RVAL_CYCLIC	CYCLIC
				RVAL_NONCYCLIC	NONCYCLIC
				RVAL_WORKCYCLIC	WORKCYCLIC
8	(8)	BITSTRING	1	*	
10	(A)	SIGNED	2	RVAL_LIMITNUM	NUMBER OF LIMIT VALUES
12	(C)	CHARACTER	24	RVAL_CCARR	LIMIT ARRAY
12	(C)	SIGNED	2	RVAL_CCLNUM(12)	LIMIT TO CERTAIN WEEKS/MONTHS

## Operation segment

The value of ADROP# in the common data segment describes the number of operation segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	128	ADROP	
0	(0)	SIGNED	4	ADRONOP	OFFSET TO NEXT OP REL TO BEGINNING OF ADR
4	(4)	CHARACTER	6	ADROPID	OPERATION ID
4	(4)	CHARACTER	4	ADRWSID	WORKSTATION
8	(8)	SIGNED	2	ADROPNO	OPERATION NUMBER
10	(A)	CHARACTER	24	ADROPDES	OPERATION DESCRIPTION
34	(22)	SIGNED	4	ADROPDUR	DURATION
38	(26)	CHARACTER	3	ADROPSM	SMOOTHING FACTOR
41	(29)	CHARACTER	3	ADROPLIM	LIMIT FOR FEEDBACK
44	(2C)	CHARACTER	1	ADROPAEC	AUTO ERROR COMPLETION Y/N
45	(2D)	CHARACTER	8	ADROPJN	JOB NAME
53	(35)	CHARACTER	1	ADROPJCL	JOB CLASS
54	(36)	SIGNED	2	ADROPHRC	HIGHEST RC NOT IN ERROR
56	(38)	CHARACTER	1	ADROPPCL	PRINT CLASS
57	(39)	CHARACTER	8	ADROPFOR	FORM NUMBER
65	(41)	CHARACTER	6	ADROPST	EARLIEST START
65	(41)	CHARACTER	2	ADROPSTD	RELATIVE DAY
67	(43)	CHARACTER	4	ADROPSTT	START TIME
71	(47)	CHARACTER	6	ADROPDED	DEADLINE
71	(47)	CHARACTER	2	ADROPDD	RELATIVE DAY
73	(49)	CHARACTER	4	ADROPDT	START TIME
77	(4D)	CHARACTER	1	ADROPFLG	OPERATION FLAGS
				ADROPAJR	AUTOMATIC CPU RELEASE



## ADR - application description

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				ADROPWK1	NOT USED
				ADROPCAN	SUPPRESS IF LATE & TIMEJOB
				ADROPTIM	SUBMIT JOB ON TIME
				ADROPWK2	NOT USED
				ADROPSUB	AUTOMATIC SUBMIT
				ADRHRC5	HIGHEST RC (ADROPHRC) SET
				ADROPWTO	DEADLINE WTO
78	(4E)	SIGNED	2	ADROP#R1	WS RESOURCE AMOUNT REQUIRED
80	(50)	BITSTRING 1... .... .111 1111	1	ADROPFLG2 ADROPCONDRJOB *	COND RECOVERY JOB FREE
81	(51)	UNSIGNED	1	ADROPTEMP	TEMPORARY WS INFO
82	(52)	SIGNED	2	ADROP#R2	WS RESOURCE AMOUNT REQUIRED
84	(54)	CHARACTER	2	*	FREE
86	(56)	SIGNED	2	ADROP#PS	NO. OF SERVERS USED
88	(58)	SIGNED	2	ADROP#IN	NO. OF INTERNAL PRED.
90	(5A)	SIGNED	2	ADROP#EX	NO. OF EXTERNAL PRED.
92	(5C)	SIGNED	2	ADROP#SR	NO. OF SPECIAL RESOURCES
94	(5E)	CHARACTER	1	ADROP_RERUT	OP REROUTEABLE
95	(5F)	CHARACTER	1	ADROP_RESTA	OP RESTARTABLE
96	(60)	CHARACTER	1	ADROPCM	CLEAN UP TYPE. I=IMMEDIATE M=MANUAL A=AUTOMATIC N=NONE
97	(61)	UNSIGNED	1	ADRTRTEMP	TEMP FOR RETRIEVAL
98	(62)	CHARACTER	2	ADROPWLM	WLM FIELDS
98	(62)	CHARACTER	1	ADROPJOB CRT	CRITICAL JOB
99	(63)	CHARACTER	1	ADROPJOB POL	LATE JOB POLICY
100	(64)	CHARACTER	1	ADRFLAG2 ADROP_USERSYS ADROP_EXPJCL ADROP MON ADROPSCRIPT ADROPEXTINF	1=NEED USER SYSOUT 1=NEED EXPANDED JCL 1:MONITOR THE JOB 1: CENTRAL SCRIPT USED EXTENDED JOB INFO AREA: 0=NOT ALLOCATED 1=ALLOCATED
101	(65)	UNSIGNED	1		
102	(66)	CHARACTER	1	ADROP_USEEXTINF	EXTENDED JOBNAME INFO: N = NOT USED Y = USED
103	(67)	CHARACTER	1	ADROP_USESEINF	SCHEDULING ENVIRONMENT NAME: N=NOT USED Y=USED
104	(68)	UNSIGNED	1	ADROPAUTINF	AUTOMATION INFO AREA: 0=NOT ALLOCATED 1=ALLOCATED
105	(69)	CHARACTER	1	ADROP_USEAUTINF	SYSTEM AUTOMATION INFO: N=NOT USED Y=USED
106	(6A)	CHARACTER	8	ADROPWLMCLASS	WLM SERVICE CLASS
114	(72)	SIGNED	2	ADROP#UF	NUMBER OF USER FIELDS
116	(74)	SIGNED	2	ADROP#CC	NUMBER OF CONDITIONS

## ADR - application description

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
	118	(76)	SIGNED	2	ADROP#CS	NUMBER OF CONDITION DEPENDENCIES
	120	(78)	UNSIGNED		ADROP_RENG	REMOTE ENGINE AREA:  0 = NOT ALLOCATED 1 = ALLOCATED
	121	(79)	CHARACTER	1	*	FREE
	122	(7A)	CHARACTER	6	*	FREE
	128	(80)	CHARACTER		ADROPFIXEND	END ADROP

### Internal predecessor sub-segments

The value of ADROP#IN in the operation segment describes the number of internal predecessor sub-segments.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
	0	(0)	STRUCTURE	16	ADROPINT (*)	INTERNAL DEPENDENCIES...
	0	(0)	CHARACTER	6	ADROPPRE	PREDECESSOR ID
	0	(0)	CHARACTER	4	AD RIP_WSID	WORK STATION ID
	4	(4)	SIGNED	2	AD RIP_OPNO	OPERATION NUMBER
	6	(6)	CHARACTER	4	ADROPTRT	TRANSPORT TIME
	6	(6)	CHARACTER	2	ADROPHH	HOURS
	8	(8)	CHARACTER	2	ADROPMM	MINUTES
	10	(A)	CHARACTER	6	*	FREE

### External predecessor sub-segments

The value of ADROP#EX in the operation segment describes the number of external predecessor sub-segments.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
	0	(0)	STRUCTURE	84	ADROPEXT (*)	EXTERNAL DEPENDENCIES...
	0	(0)	CHARACTER	22	ADROPEPR	PREDECESSOR ID
	0	(0)	CHARACTER	16	ADROPEAD	EXTERNAL PREDECESSOR AD ID
	16	(10)	CHARACTER	6	ADROPEOP	PREDECESSOR ID
	16	(10)	CHARACTER	4	ADREP_WSID	WORK STATION ID
	20	(14)	SIGNED	2	ADREP_OPNO	OPERATION NUMBER
	22	(16)	CHARACTER	4	ADROPETR	TRANSPORT TIME
	26	(1A)	CHARACTER	50	ADROPEDE	DESCRIPTION
	76	(4C)	CHARACTER	1	ADROPLTP	LTP PRINT OPTION
	77	(4D)	CHARACTER	1	ADROPEFLG	FLAGS
					ADROPEWRK	WORK
	78	(4E)	CHARACTER	6	*	FREE

## Special resources sub-segment

The value of ADROP#SR in the operation segment describes the number of special resource sub-segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	64	ADROPSRS (*)	SPECIAL RESOURCES
0	(0)	CHARACTER	44	ADROPSRN	NAME RESOURCE
44	(2C)	SIGNED	4	ADROPSRA	NUMERIC AMOUNT
48	(30)	CHARACTER	1	ADROPSRT	S = SHARED, X = EXCLUSIVE
49	(31)	CHARACTER	1	ADROPSRK	KEEP ON ERROR FLAG (Y N <BLANK>)
50	(32)	CHARACTER	1	ADROPSRAVACO	SPECIAL RESOURCE AVAILABILITY (Y N R <BLANK>)
51	(33)	CHARACTER	13	*	FREE

## Extended job name sub-segment

You can have the extended job name sub-segment in the operation segment only if ADROPEXTINF is equal to 1 in the operation segment.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	200	ADROP_EXTINFO	
0	(0)	CHARACTER	54	ADROPEXTNAME	EXTENDED JOB NAME
54	(36)	CHARACTER	16	ADROPSENAME	SCHEDULING ENVIRONMENT NAME
70	(46)	CHARACTER	130	*	FREE

## System automation info sub-segment

You can have the system automation sub-segment in the operation segment only if ADROPAUTINF is equal to 1 in the operation segment.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	336	ADROP_AUTINFO	AUTOMATION INFORMATION
0	(0)	CHARACTER	256	ADROPCOMMTEXT	SYSTEM AUTOMATION COMMAND TEXT
0	(0)	CHARACTER	64	ADROPCOMMTEXT1	SYSTEM AUTOMATION COMMAND TEXT, LINE 1
64	(40)	CHARACTER	64	ADROPCOMMTEXT2	SYSTEM AUTOMATION COMMAND TEXT, LINE 2
128	(80)	CHARACTER	64	ADROPCOMMTEXT3	SYSTEM AUTOMATION COMMAND TEXT, LINE 3
192	(C0)	CHARACTER	63	ADROPCOMMTEXT4	SYSTEM AUTOMATION COMMAND TEXT, LINE 4
255	(FF)	CHARACTER	1		RESERVED
256	(100)	CHARACTER	8	ADROPAUTOOPER	SYSTEM AUTOMATION AUTOMATED FUNCTION (FOR OPERATION)

## ADR - application description

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
264	(108)	CHARACTER	8	ADROPSECELEM	SYSTEM AUTOMATION SECURITY ELEMENT
272	(110)	CHARACTER	64	ADROPCOMPINFO	SYSTEM AUTOMATION COMPLETION INFO

### Condition sub-segment

The value of ADROP#CC in the operation segment describes the number of condition sub-segments.

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	32	ADROP_COND_INFO(*)	
0	(0) SIGNED	2	ADROPSCO_ID	CONDITION NUMBER
2	(2) SIGNED	2	ADROPSCO_SIMPNO	NUMBER OF CONDITION DEPENDENCIES
4	(4) SIGNED	2	ADROPSCO_TYPE	CONDITION TYPE: 1 = ONE OF 2 = AT LEAST N OF 3 = ALL
6	(6) SIGNED	2	ADROPSCO_COUNT	CONDITION COUNTER - ONLY FOR TYPE 2
8	(8) CHARACTER	24	ADROPSCO_DESCR	CONDITION DESCRIPTION

### Condition dependency sub-segment

The value of ADROPSCO\_SIMPNO in the condition segment describes the number of condition dependencies defined for the current condition sub-segment. The value of ADROP#CS in the operation segment describes the total number of condition dependencies defined for the current operation.

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	56	ADROP_COND_SIMPLE(*)	
0	(0) SIGNED	2	ADROPSCO_ID	
2	(2) CHARACTER	22	ADROPSCO_PREDID	
2	(2) CHARACTER	16	ADROPSCO_PREAD	
18	(12) CHARACTER	6	ADROPSCO_PREOP	
18	(12) CHARACTER	4	ADROPSCO_PREWSID	
22	(16) SIGNED	2	ADROPSCO_PREOPNO	
24	(18) CHARACTER	2	ADROPSCO_PRETYP	CONDITION DEPENDENCY CHECK TYPE: ST = STATUS RC = RETURN CODE
26	(1A) CHARACTER	2	ADROPSCO_PRELOG	OPERATOR: GE,GT,EQ,LT,LE,NE,RG
28	(1C) CHARACTER	4	ADROPSCO_VALRC	RC VALUE
32	(20) CHARACTER	4	ADROPSCO_VALRC2	RC2 VALUE
36	(24) CHARACTER	1	ADROPSCO_VALST	ST VALUE
37	(25) CHARACTER	1	ADROPSCO_DEPTYP	I=INT E=EXT é
38	(26) CHARACTER	1	*	NOT USED
39	(27) BITSTRING	1	ADROPSCO_FLAGS	
	1... ....		ADROPSCO_WRK	WORK FLAGS
	.111 1111		*	
40	(28) CHARACTER	8	ADROPSCO_STEP	PROCEDURE INVOCATION STEP NAME
48	(30) CHARACTER	8	ADROPSCO_PSTEP	STEP NAME
Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	74	ADROP_USERFIELDS	(*)
0	(0) CHARACTER	16	ADROPUF_NAME	FIELD NAME
16	(10) CHARACTER	54	ADROPUF_VALUE	FIELD VALUE
70	(46) CHARACTER	4	*	NOT USED
Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	200	ADROP_RENG_INFO	
0	(0) CHARACTER	16	ADROPRE_JSNAME	AD ID
16	(10) CHARACTER	1	ADROPRE_SHADOW	Y FOR SHADOW JOBS
17	(11) CHARACTER	3	ADROPRE_OPNO	OPERATION NUMBER
20	(14) CHARACTER	40	ADROPRE_JOBNAME	JOB NAME TIVOLI WORKLOAD SCHEDULER DISTRIBUTED

## ADR - application description

60	(3C)	CHARACTER	16	ADROPRE_JSWS	JOBSTREAM WORKSTATION TIVOLI WORKLOAD SCHEDULER DISTRIBUTED
76	(4C)	CHARACTER	1	ADROPRE_COMP	COMPLETE ON BIND
77	(4D)	CHARACTER	123	*	FREE

### Cross reference

Name	Hex Offset	Hex Value	Level
ADR	0		1
ADRCAL	95		3
ADRCALDEF	94	10	4
ADRCOMMON	0		2
ADRDESCR	24		3
ADRDLIM	83		3
ADRDSM	80		3
ADREP_OPNO	14		4
ADREP_WSID	10		4
ADRERD	94	80	4
ADREYE	19		3
ADRFLAGS	94		3
ADRFLAG2	64		2
ADRFOP	90		3
ADRFROM	1E		3
ADRFRUN	8C		3
ADRGROUP	3C		3
ADRGROUPID	A5		3
ADRHRC	4D	02	3
ADRID	2		4
ADRIP_OPNO	4		3
ADRIP_WSID	0		3
ADRJOB	94	40	4
ADRKEY	2		3
ADRLDATE	6D		3
ADRLTIME	73		3
ADRLUSER	77		3
ADRLUTS	C8		3
ADRMON	94	20	4
ADRODESC	54		3
ADRONOP	0		2
ADROP	0		1
ADROP_AUTOINFO	0		1
ADROP_COND_INFO	0		1
ADROP_COND_SIMPLE	0		1
ADROP_EXPJCL	64	40	3
ADROP_EXTINFO	0		1
ADROP_RENG	78		2
ADROP_RENG_INFO	0		1
ADROP_RERUT	5E		2
ADROP_RESTA	5F		2
ADROP_USEAUTINF	69		2
ADROP_USEEXTINF	66		2
ADROP_USERFIELDS	0		1
ADROP_USERSYS	64	80	3
ADROP_USESEINF	67		2

## ADR - application description

Name	Hex Offset	Hex Value	Level
ADROP#	86		3
ADROP#CC	74		2
ADROP#CS	76		2
ADROP#EX	5A		2
ADROP#IN	58		2
ADROP#PS	56		2
ADROP#R1	4E		2
ADROP#R2	52		2
ADROP#SR	5C		2
ADROP#UF	72		2
ADROPAEC	2C		2
ADROPAJR	4D	80	3
ADROPAUTINF	68		2
ADROPAUTOOPER	100		2
ADROPCAN	4D	20	3
ADROPCM	60		2
ADROPCO_COUNT	6		2
ADROPCO_DESCR	8		2
ADROPCO_ID	0		2
ADROPCO_SIMPNO	2		2
ADROPCO_TYPE	4		2
ADROPCOMMTEXT	0		2
ADROCOMMTEXT1	0		3
ADROCOMMTEXT2	40		3
ADROCOMMTEXT3	80		3
ADROCOMMTEXT4	C0		3
ADROPCOMPINFO	110		2
ADROPCONDRJOB	50	80	3
ADROPDD	47		3
ADROPDED	47		2
ADROPDES	A		2
ADROPDT	49		3
ADROPDUR	22		2
ADROPEAD	0		3
ADROPEDE	1A		2
ADROPEFLG	4D		2
ADROPEOP	10		3
ADROPEPR	0		2
ADROPETR	16		2
ADROPEWRK	4D	80	3
ADROPEXT	0		1
ADROPEXTINF	65		2
ADROPEXTNAME	0		2
ADROPFILLER	FF		3
ADROPFIXEND	80		2
ADROPFLG	4D		2
ADROPFLG2	50		2
ADROPFOR	39		2
ADROPHH	6		3
ADROPHRC	36		2
ADROPID	4		2

## ADR - application description

Name	Hex Offset	Hex Value	Level
ADROPINT	0		1
ADROPJCL	35		2
ADROPJN	2D		2
ADROPJOBCRT	62		3
ADROPJOBPOL	63		3
ADROPLIM	29		2
ADROPLTP	4C		2
ADROPMM	8		3
ADROPMON	64	20	3
ADROPNO	8		3
ADROP PCL	38		2
ADROP PRE	0		2
ADROP PRE_COMP	4C		2
ADROP PRE_JOBNAME	14		2
ADROP PRE_JSNAME	0		2
ADROP PRE_JSWS	3C		2
ADROP PRE_OPNO	11		2
ADROP PRE_SHADOW	10		2
ADROP SC_DETYP	25		2
ADROP SC_FLAGS	27		2
ADROP SC_ID	0		2
ADROP SC_PREAD	2		3
ADROP SC_PREDID	2		2
ADROP SC_PRELOG	1A		2
ADROP SC_PREOP	12		3
ADROP SC_PREOPNO	16		4
ADROP SC_PRETYP	18		2
ADROP SC_PREWSID	12		4
ADROP SC_PSTEP	30		2
ADROP SC_STEP	28		2
ADROP SC_VALRC	1C		2
ADROP SC_VALRC2	20		2
ADROP SC_VALST	24		2
ADROP SC_WRK	27	80	3
ADROP SCRIPT	64	10	3
ADROP SECELEM	108		2
ADROP SENAME	36		2
ADROP SM	26		2
ADROP SRA	2C		2
ADROP SRAVACO	32		2
ADROP SRK	31		2
ADROP SRN	0		2
ADROP SRS	0		1
ADROP SRT	30		2
ADROP ST	41		2
ADROP STD	41		3
ADROP STT	43		3
ADROP SUB	4D	04	3
ADROP TEMP	51		2
ADROP TIM	4D	10	3
ADROP TRT	6		2

## ADR - application description

Name	Hex Offset	Hex Value	Level
ADROPUF_NAME	0		2
ADROPUF_VALUE	10		2
ADROPWK1	4D	40	3
ADROPWK2	4D	08	3
ADROPWLM	62		2
ADROPWLMCLASS	6A		2
ADROPWTO	4D	01	3
ADROWNER	44		3
ADRPRIOR	7F		3
ADRR	4		2
ADRRARRI	52		2
ADRRDAY	56		3
ADRRDAYN	0		2
ADRRDAYNEG	0		1
ADRRDAYP	0		2
ADRRDAYPOS	0		1
ADRRDEAD	56		2
ADRRDESC	1F		2
ADRREVYET	72		2
ADRREYR	6E		2
ADRRFROM	13		2
ADRRJVT	5C		2
ADRRNEG	10		2
ADRRNPOS	E		2
ADRRNRUN	0		2
ADRRROUT	19		2
ADRRPER	6		2
ADRRRDEF	0		2
ADRRRDEFSEG	0		1
ADRRRDLEN	6C		2
ADRRTIME	58		3
ADRRTYPE	51		2
ADRRULE	12		2
ADRRUN	0		1
ADRRUN#	88		3
ADRRUNEND	78		2
ADRSTAT	12		4
ADRTO	13		4
ADRTRTEMP	61		2
ADRVARSECT	D0		2
ADRVERS	1D		3
ADRWSID	4		3
RVAL	0		1
RVAL_ALLDAYS	30	80	4
RVAL_CCARR	C		3
RVAL_CCLNUM	C		4
RVAL_CYCLE	0		1
RVAL_CYCLENAME	0		3
RVAL_CYCLENUM	38		2
RVAL_CYCLEOP	20		2
RVAL_CYCLESPEC	0		2



Name	Hex Offset	Hex Value	Level
RVAL_CYCLETYP	8		3
RVAL_CYCLIC	8	20	4
RVAL_DAYSPEC	30		2
RVAL_DAYTYPE	30		3
RVAL_DEFAULT	28	01	4
RVAL_ESTIMATE	24		2
RVAL_EVERY	28	80	4
RVAL_FACTOR	28		2
RVAL_FORW	0		1
RVAL_FORWFAC	0		2
RVAL_FORWNUM	2C		3
RVAL_FORWOP	18		2
RVAL_FREEDAYS	30	20	4
RVAL_FREQ	28		3
RVAL_LAST	0		1
RVAL_LASTFAC	0		2
RVAL_LASTNUM	2E		3
RVAL_LASTOP	1C		2
RVAL_LENGTH	0		2
RVAL_LIMITNUM	A		3
RVAL_NONCYCLIC	8	10	4
RVAL_ONLY	28	40	4
RVAL_ORIGSHIFT	2A		3
RVAL_PREDEF	8	80	4
RVAL_TIMESTAMP	4		2
RVAL_TS_DATE	4		3
RVAL_TS_TIME	A		3
RVAL_USER	8	40	4
RVAL_WEEKDAY	31		3
RVAL_WEEKDAYS	30	10	4
RVAL_WORKCYCLIC	8	08	4
RVAL_WORKDAYS	30	40	4

## AWSN - Actual workstation resource report record in DP

Name : DCLAWSN

Function:

Describes layout of parallel servers, R1 and R2 indicating the actual workstation load measured for these resources. There is one record for each workstation and 'day' in the plan. A 'day' starts/ends on the time given in PLANSTART. For each 15 minutes an amount is recorded of PS/R1/R2 resources required (according to the operation descriptions) multiplied by 15 planned server minutes for all operations with start-end contained in the interval (if 1/3 of the interval covered - 1/3\*amount). An example: an operation running between 14.30 and 14.48 using 1 server, 50 R1, and 2 R2 will record 15 server minutes, 15\*50 R1 units and 15\*2 R2 units in the 14.30-14.45 slot and will record 3 server minutes, 3\*50 R1 units and 3\*2 R2 units in the 14.45-15.00 slot. The records have the standard recsize and keysize of DPIN records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	263	AWSAREA	PARALLEL SERV   R1   R2 REC

## AWSN - Actual workstation resource report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	114	AWSKEY	KEY
0	(0)	SIGNED	2	AWSTYPE	ALWAYS TYPE 7
2	(2)	CHARACTER	34	*	
36	(24)	CHARACTER	4	AWSWSID	WORKSTATION ID
40	(28)	SIGNED	2	AWSSTYPE	SUBTYPE SERVER MINUTES= 1 R1 = 2 R2 = 3
42	(2A)	CHARACTER	6	AWSDATE	REPORT 'DAY' (YYMMDD)
48	(30)	CHARACTER	2	AWSSTRNG	R1   R2 STRING IN REPORTS BLANK FOR PARALLEL SERV
50	(32)	CHARACTER	64	*	TO ADD UP THE KEY
114	(72)	CHARACTER	149	AWSDATA	DATA PART OF AWS RECORD
114	(72)	SIGNED	2	AWSFACT	FACTOR TO MULTIPLY AMOUNT
116	(74)	UNSIGNED	1	AWSAMT (96)	OF RESOURCES
212	(D4)	CHARACTER	51	*	TO ADD UP TO STD RECSIZE

## Cross reference

Name	Hex Offset	Hex Value	Level
AWSAMT	74		3
AWSAREA	0		1
AWSDATA	72		2
AWSDATE	2A		3
AWSFACT	72		3
AWSKEY	0		2
AWSSTRNG	30		3
AWSSTYPE	28		3
AWSTYPE	0		3
AWSWSID	24		3

## CAL - Calendar definition record

Name : DCLCAL

Function:

This segment declares a calendar definition, physically located in the workstation description database (EQQWSDS)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	96	CALENDAR	CALENDAR HEADER
0	(0)	CHARACTER	2	CALTYPE	RECORD TYPE = '06'
2	(2)	CHARACTER	8	CALKEY	KEY OF CALENDAR
2	(2)	SIGNED	2	CALNUM	RECORD NUMBER
4	(4)	CHARACTER	4	CALEYE	EYE CATCHER (ALWAYS='CAL')
8	(8)	SIGNED	2	*	RESERVED
10	(A)	CHARACTER	16	CALIDENT	IDENTITY OF THE CALENDAR
26	(1A)	CHARACTER	30	CALDESC	DESCRIPTION OF CALENDAR

## CAL - Calendar definition record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
56	(38)	CHARACTER	8	CALUPDU	TSO USER IDENTITY OF LAST UPDATING USER
64	(40)	CHARACTER	6	CALUPDD	DATE (YYMMDD FORMAT) AND
70	(46)	CHARACTER	4	CALUPDT	TIME (HHMM FORMAT) WHEN CALENDAR WAS LAST UPDATED
74	(4A)	SIGNED	2	CAL#SPEC	NUMBER OF SPECIFIC DATES AND WEEK DAYS
76	(4C)	CHARACTER	4	CALSHIFT	SHIFT TIME
80	(50)	UNSIGNED	1	CALVER	RECORD LAYOUT VERSION
81	(51)	CHARACTER	7	*	FREE
88	(58)	CHARACTER	8	CALLUTS	LAST UPDATE TIMESTAMP
96	(60)	CHARACTER		CALVARS	VARIABLE SECTION

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
96	(60)	STRUCTURE	*	CALDATES	EACH CALENDAR WEEK DAY
96	(60)	CHARACTER	52	CALDAT (*)	OR SPECIFIC DATE HOLDS THE FOLLOWING FIELDS
96	(60)	CHARACTER	6	CALDATE	SPECIFIC DATE YYMMDD OR
96	(60)	CHARACTER	1	CALWEEKDAY	WEEK DAY 1=MONDAY 7=SUNDAY
97	(61)	CHARACTER	1	CALWEEKDAYM	BLANK IF WEEKDAY
102	(66)	CHARACTER	30	CALCOMM	COMMENT FOR THE WEEK DAY OR SPECIFIC DATE
132	(84)	CHARACTER	1	CALSTAT	WEEK DAY OR SPECIFIC DATE STATUS (W=WORK, F=FREE)
133	(85)	CHARACTER	15	*	SPARE

## Cross reference

Name	Hex Offset	Hex Value	Level
CAL#SPEC	4A		2
CALCOMM	66		3
CALDAT	60		2
CALDATE	60		3
CALDATES	60		1
CALDESC	1A		2
CALENDAR	0		1
CALEYE	4		3
CALIDENT	A		2
CALKEY	2		2
calluts	58		2
CALNUM	2		3
CALSHIFT	4C		2
CALSTAT	84		3
CALTYPE	0		2
CALUPDD	40		2
CALUPDT	46		2

## CAL - Calendar definition record

Name	Hex Offset	Hex Value	Level
CALUPDU	38		2
CALVARS	60		2
CALVER	50		2
CALWEEKDAY	60		4
CALWEEKDAYM	61		4

## CAPP - Completed/deleted application report record in DP

Name : DCLCAPP

Function:

Describes the layout of CAPP records representing report data on occurrences which have been completed/deleted in current plan. Occurrences that belong to one or more 24-hour periods that are automatically reported are sorted before occurrences which belong to the current 24-hours period. The records have the standard recsize and keysize of DPIN records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	264	CAPAREA	CAP RECORD
0	(0)	CHARACTER	115	CAPKEY	KEY
0	(0)	SIGNED	2	CAPTYPE	TYPE IS ALWAYS 5
2	(2)	SIGNED	2	CAPSTYPE	SUBTYPE 1 = OLD 24-HOURS SUBTYPE 2 = CURRENT 24-H.
4	(4)	CHARACTER	34	*	ADJUST ADID
38	(26)	CHARACTER	26	CAPOCC	OCCURRENCE IDENTIFICATION
38	(26)	CHARACTER	16	CAPADID	APPLICATION IDENTIFICATION
54	(36)	CHARACTER	10	CAPOPIA	PLANNED OCC INPUT ARRIVAL
54	(36)	CHARACTER	6	CAPOPIAD	DAY (YYMMDD)
54	(36)	CHARACTER	4	CAPOPIAY	(YYMM )
58	(3A)	CHARACTER	2	CAPOPIAE	( DD)
60	(3C)	CHARACTER	4	CAPOPIAT	TIME (HHMM)
60	(3C)	CHARACTER	2	CAPOPIAH	TIME (HH )
62	(3E)	CHARACTER	2	CAPOPIAM	TIME ( MM)
64	(40)	CHARACTER	10	CAPORC	REAL OCCURRENCE COMPLETION (BLANK FOR DELETED)
64	(40)	CHARACTER	6	CAPORCDT	DAY (YYMMDD)   BLANK
64	(40)	CHARACTER	4	CAPORCY	(YYMM )
68	(44)	CHARACTER	2	CAPORCD	( DD)
70	(46)	CHARACTER	4	CAPORCT	TIME (HHMM)   BLANK
70	(46)	CHARACTER	2	CAPORCH	TIME (HH )
72	(48)	CHARACTER	2	CAPORCM	TIME ( MM)
74	(4A)	CHARACTER	7	CAPWSID	WSID OF OPERATION
74	(4A)	CHARACTER	3	CAPWSIDN	OPERATION NUMBER
77	(4D)	CHARACTER	4	CAPWSIDS	WORKSTATION NAME
81	(51)	CHARACTER	16	CAPOWID	OWNER OF OPERATION
97	(61)	CHARACTER	8	CAPJOB	JOB NAME FOR OPERATION
105	(69)	CHARACTER	1	CAPADDED	HOW ADDED TO PLAN
106	(6A)	CHARACTER	9	*	TO FILL UP THE KEY
115	(73)	CHARACTER	149	CAPDATA	DATA PART OF CAP RECORD
115	(73)	CHARACTER	24	CAPOTXT	APPLICATION TEXT
139	(8B)	CHARACTER	1	CAPOPRI	PRIORITY

## CAPP - Completed/deleted application report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
140	(8C)	CHARACTER	10	CAPOAIA	ACTUAL OCC INPUT ARRIVAL (BLANK FOR OCC DELETED BEFORE START)
140	(8C)	CHARACTER	6	CAPOAIAD	DAY (YYMMDD)   BLANK
140	(8C)	CHARACTER	4	CAPOAIAY	(YYMM )
144	(90)	CHARACTER	2	CAPOAIAE	( DD)
146	(92)	CHARACTER	4	CAPOAIAT	TIME (HHMM)   BLANK
146	(92)	CHARACTER	2	CAPOAIAH	TIME (HH )
148	(94)	CHARACTER	2	CAPOAIAM	TIME ( MM)
150	(96)	CHARACTER	4	CAPAIDL	OCCURENCE INPUT DELAY (9959 FOR ALL ABOVE 100 H)
150	(96)	CHARACTER	2	CAPAIDLH	TIME (HH )   BLANK
152	(98)	CHARACTER	2	CAPAIDLM	( MM)
154	(9A)	CHARACTER	4	CAPAODL	OCCURENCE OUTPUT DELAY (9959 FOR ALL ABOVE 100 H)
154	(9A)	CHARACTER	2	CAPAODLH	TIME (HH )   BLANK
156	(9C)	CHARACTER	2	CAPAODLM	( MM)
158	(9E)	CHARACTER	10	CAPOPC	PLANNED OCC. COMPLETION
158	(9E)	CHARACTER	6	CAPOPCDT	DAY (YYMMDD)
158	(9E)	CHARACTER	4	CAPOPCY	(YYMM )
162	(A2)	CHARACTER	2	CAPOPCD	( DD)
164	(A4)	CHARACTER	4	CAPOPCT	TIME (HHMM)
164	(A4)	CHARACTER	2	CAPOPCH	TIME (HH )
166	(A6)	CHARACTER	2	CAPOPCM	TIME ( MM)
168	(A8)	CHARACTER	4	CAPOERR	OCCURENCE ERROR CODE
172	(AC)	CHARACTER	24	CAPOPTXT	OPERATION TEXT
196	(C4)	CHARACTER	10	CAPPIA	SPEC OPER INPUT ARRIVAL
196	(C4)	CHARACTER	6	CAPPIAD	DAY (YYMMDD)
196	(C4)	CHARACTER	4	CAPPIAY	(YYMM )
200	(C8)	CHARACTER	2	CAPPIAE	( DD)
202	(CA)	CHARACTER	4	CAPPIAT	TIME (HHMM)
202	(CA)	CHARACTER	2	CAPPIAH	TIME (HH )
204	(CC)	CHARACTER	2	CAPPIAM	TIME ( MM)
206	(CE)	CHARACTER	10	CAPPAIA	ACTUAL OPER INPUT ARRIVAL (BLANK FOR DELETED OPER BEFORE STARTED)
206	(CE)	CHARACTER	6	CAPPAIAD	DAY (YYMMDD)   BLANK
206	(CE)	CHARACTER	4	CAPPAIAY	(YYMM )
210	(D2)	CHARACTER	2	CAPPAIAE	( DD)
212	(D4)	CHARACTER	4	CAPPAIAT	TIME (HHMM)   BLANK
212	(D4)	CHARACTER	2	CAPPAIAH	TIME (HH )
214	(D6)	CHARACTER	2	CAPPAIAM	TIME ( MM)
216	(D8)	CHARACTER	4	CAPOIDL	OPERATION INPUT DELAY (9959 FOR ALL ABOVE 100 H)
216	(D8)	CHARACTER	2	CAPOIDLH	TIME (HH )   BLANK
218	(DA)	CHARACTER	2	CAPOIDLM	( MM)
220	(DC)	CHARACTER	10	CAPPPC	SPECIFIC OPER COMPLETION
220	(DC)	CHARACTER	6	CAPPPCDT	DAY (YYMMDD)
220	(DC)	CHARACTER	4	CAPPPCY	(YYMM )
224	(E0)	CHARACTER	2	CAPPPCD	( DD)
226	(E2)	CHARACTER	4	CAPPPCT	TIME (HHMM)
226	(E2)	CHARACTER	2	CAPPPCH	TIME (HH )
228	(E4)	CHARACTER	2	CAPPPCM	TIME ( MM)

## CAPP - Completed/deleted application report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
230	(E6)	CHARACTER	10	CAPPRC	REAL OPERATION COMPLETION (BLANK FOR DELETED OPER)
230	(E6)	CHARACTER	6	CAPPRCT	DAY (YYMMDD)   BLANK
230	(E6)	CHARACTER	4	CAPPRCY	(YYMM )
234	(EA)	CHARACTER	2	CAPPRCD	( DD)
236	(EC)	CHARACTER	4	CAPPACT	TIME (HHMM)   BLANK
236	(EC)	CHARACTER	2	CAPPRCH	TIME (HH )
238	(EE)	CHARACTER	2	CAPPRCM	TIME ( MM)
240	(F0)	CHARACTER	4	CAPOODL	OPERATION OUTPUT DELAY (9959 FOR ALL ABOVE 100 H)
240	(F0)	CHARACTER	2	CAPOODLH	TIME (HH )   BLANK
242	(F2)	CHARACTER	2	CAPOODLM	( MM)
244	(F4)	CHARACTER	4	CAPOPERR	OPERATION ERROR CODE
248	(F8)	CHARACTER	16	CAPOPUDATA	OPERATION USERDATA

## Cross reference

Name	Hex Offset	Hex Value	Level
CAPADDED	69		3
CAPADID	26		4
CAPAIDL	96		3
CAPAIDLH	96		4
CAPAIDLM	98		4
CAPAODL	9A		3
CAPAODLH	9A		4
CAPAODLM	9C		4
CAPAREA	0		1
CAPDATA	73		2
CAPJOBN	61		3
CAPKEY	0		2
CAPOAIA	8C		3
CAPOAIAD	8C		4
CAPOAIAE	90		5
CAPOAIAH	92		5
CAPOAIAM	94		5
CAPOAIAT	92		4
CAPOAIAY	8C		5
CAPOCC	26		3
CAPOERR	A8		3
CAPOIDL	D8		3
CAPOIDLH	D8		4
CAPOIDLM	DA		4
CAPOODL	F0		3
CAPOODLH	F0		4
CAPOODLM	F2		4
CAPOPC	9E		3
CAPOPCD	A2		5
CAPOPCDT	9E		4
CAPOPCH	A4		5
CAPOPCM	A6		5
CAPOPCT	A4		4

## CAPP - Completed/deleted application report record in DP

Name	Hex Offset	Hex Value	Level
CAPOPCY	9E		5
CAPOPERR	F4		3
CAPOPIA	36		4
CAPOPIAD	36		5
CAPOPIAE	3A		6
CAPOPIAH	3C		6
CAPOPIAM	3E		6
CAPOPIAT	3C		5
CAPOPIAY	36		6
CAPOPRI	8B		3
CAPOPTXT	AC		3
CAPOPUDATA	F8		3
CAPORC	40		3
CAPORCD	44		5
CAPORCDT	40		4
CAPORCH	46		5
CAPORCM	48		5
CAPORCT	46		4
CAPORCY	40		5
CAPOTXT	73		3
CAPOWID	51		3
CAPPACT	EC		4
CAPPAIA	CE		3
CAPPAIAD	CE		4
CAPPAIAE	D2		5
CAPPAIAH	D4		5
CAPPAIAM	D6		5
CAPPAIAT	D4		4
CAPPAIAY	CE		5
CAPPPC	DC		3
CAPPPCD	E0		5
CAPPPCDT	DC		4
CAPPPCH	E2		5
CAPPPCM	E4		5
CAPPPCT	E2		4
CAPPPCY	DC		5
CAPPPIA	C4		3
CAPPPIAD	C4		4
CAPPPIAE	C8		5
CAPPPIAH	CA		5
CAPPPIAM	CC		5
CAPPPIAT	CA		4
CAPPPIAY	C4		5
CAPPRC	E6		3
CAPPRCD	EA		5
CAPPRCH	EC		5
CAPPRCM	EE		5
CAPPRCT	E6		4
CAPPRCY	E6		5
CAPSTYPE	2		3
CAPTYPE	0		3

## CAPP - Completed/deleted application report record in DP

Name	Hex Offset	Hex Value	Level
CAPWSID	4A		3
CAPWSIDN	4A		4
CAPWSIDS	4D		4

## CASE - Auto recovery case code list

Name : DCLCASE

Function:

A case code is set up to represent one or more error codes or return codes. A function may use this by allowing a case code to be given instead of one or more error or return codes, the case code will then represent all the codes in its list. The list is not recursive, a code in the list is not regarded as another case code. The lists are placed adjacent in storage, the start address of list i+1 is the end address of list i.

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CASELIST	CASE CODE LIST
0	(0)	CHARACTER	4	CASECODE	CODE REPRESENTING THIS LIST
4	(4)	ADDRESS	4	CASENEXT	ADDRESS TO NEXT LIST
8	(8)	CHARACTER	4	CASEMEMB (*)	MEMBERS, THE CODES COLLECTIVELY

## CPLREC01 - Current plan header record

Name : DCLCPR01

Function:

This segment declares the current plan header record, physically located in EQQCPxDS and EQQNCPDS.

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	188	CPLREC01	CURRENT PLAN HDR RECORD
0	(0)	CHARACTER	12	CPLKEY01	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 01
2	(2)	CHARACTER	10	CPLKF01	SHOULD CONTAIN BLANKS
12	(C)	CHARACTER	176	CPLBDY01	HDR RECORD BODY
12	(C)	CHARACTER	4	CPLYEY01	EYECATCHER
16	(10)	UNSIGNED	1	CPLVERS01	VERSION NUMBER
17	(11)	CHARACTER	1	*	FREE
18	(12)	CHARACTER	10	CPLCR	CURRENT PLAN CREATION
18	(12)	CHARACTER	6	CPLCRDAT	DATE
24	(18)	CHARACTER	4	CPLCRTIM	TIME
28	(1C)	CHARACTER	10	CPLEND	LAST PLAN NEXT PERIOD END
28	(1C)	CHARACTER	6	CPLENDAT	DATE
34	(22)	CHARACTER	4	CPLENTIM	TIME
38	(26)	CHARACTER	10	CPLBU	LAST BACKUP
38	(26)	CHARACTER	6	CPLBUDAT	DATE
44	(2C)	CHARACTER	4	CPLBUTIM	TIME
48	(30)	CHARACTER	10	CPLLP	TAIL END



## CPLREC01 - Current plan header record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
48	(30)	CHARACTER	6	CPLLPDAT	DATE
54	(36)	CHARACTER	4	CPLLP TIM	TIME
58	(3A)	CHARACTER	10	CPLREPS	REPORT PERIOD START
58	(3A)	CHARACTER	6	CPLREPSD	DATE
64	(40)	CHARACTER	4	CPLREPST	TIME
68	(44)	SIGNED	4	CPL#REPL	NUMBER OF REPLANS SINCE LAST PLAN NEXT
72	(48)	SIGNED	4	CPL#OPS	TOTAL NUMBER OF OPERATIONS RECORDS
76	(4C)	SIGNED	4	CPLMAXOP	THE TOTAL NUMBER OF POSSIBLE CONCURRENT OPS
80	(50)	SIGNED	4	CPLMAXOC	CURRENT MAX OCCURRENCE RECORD NUMBER
84	(54)	SIGNED	4	CPLMAXNW	CURRENT MAX NETWORK NUMBER
88	(58)	SIGNED	4	CPLMAX06	CURRENT MAX TYPE 06 RECORD
92	(5C)	SIGNED	4	CPLMAX07	CURRENT MAX TYPE 07 RECORD
96	(60)	SIGNED	4	CPLMIN08	CURRENT MIN TYPE 08 RECORD
100	(64)	CHARACTER	32	cpl01Counts	MAIN COUNTERS
100	(64)	SIGNED	4	CPL01C_PIFADD	..NUM PIF OCC ADDS
104	(68)	SIGNED	4	CPL01C_MCPADD	..NUM MCP OCC ADDS
108	(6C)	SIGNED	4	CPL01C_ETTADD	..NUM ETT OCC ADDS
112	(70)	SIGNED	4	CPL01C_ARCADD	..NUM AR OCC ADDS
116	(74)	SIGNED	4	CPL01C_COPOP	..NUM COPIED OPERS
120	(78)	SIGNED	4	CPL01C_COPOCC	..NUM COPIED OCCS
124	(7C)	SIGNED	4	CPL01C_CRITJOBS	NUMBER OF CRITICAL JOBS
128	80	SIGNED	4	CPL01C_CRITPRED	TOTAL NUMBER OF CRITICAL PREDECESSORS
132	(84)	CHARACTER	8	CPL01TOKEN_FULL	OPERATION FULL TOKEN
132	(84)	CHARACTER	4	CPL01TOKEN_PRE	prefix
136	(88)	UNSIGNED	4	CPL01TOKEN	OPCTOKEN
140	(8C)	CHARACTER	4	CPL01BUGMTD	LAST BACKUP DATE, GMT
144	(90)	UNSIGNED	4	CPL01BUGMTT	LAST BACKUP TIME, GMT
148	(94)	CHARACTER	10	CPLLEVEL	LEVEL OF CURRENT PLAN DS
148	(94)	CHARACTER	2	CPLLEV_VER	VERION OF CP DS
150	(96)	CHARACTER	8	CPLLEV_FMID	FMID OF CP DS
158	(9E)	CHARACTER	30	*	SPARE

### Cross reference

Name	Hex Offset	Hex Value	Level
CPL#OPS	48		3
CPL#REPL	44		3
CPLBDY01	C		2
CPLBU	26		3
CPLBUDAT	26		4
CPLBUTIM	2C		4
CPLCR	12		3
CPLCRDAT	12		4
CPLCRTIM	18		4
CPLEND	1C		3

## CPLREC01 - Current plan header record

Name	Hex Offset	Hex Value	Level
CPLENDAT	1C		4
CPLENTIM	22		4
CPLEYE01	C		3
CPLKEY01	0		2
CPLKF01	2		3
CPLLEV_FMID	96		4
CPLLEV_VER	94		4
CPLLEVEL	94		3
CPLLP	30		3
CPLLPDAT	30		4
CPLLPTIM	36		4
CPLMAXNW	54		3
CPLMAXOC	50		3
CPLMAXOP	4C		3
CPLMAX06	58		3
CPLMAX07	5C		3
CPLMIN08	60		3
CPLREC01	0		1
CPLREPS	3A		3
CPLREPSD	3A		4
CPLREPST	40		4
CPLVERS01	10		3
CPL01BUGMTD	8C		3
CPL01BUGMTT	90		3
CPL01C_ARCADD	70		4
CPL01C_COPOCC	78		4
CPL01C_COPOP	74		4
CPL01C_CRITJOBS	7C		4
CPL01C_CRITPRED	80		4
CPL01C_ETTADD	6C		4
CPL01C_MCPADD	68		4
CPL01C_PIFADD	64		4
CPL01COUNTS	64		3
CPL01TOKEN	88		4
CPL01TOKEN_FULL	84		3
CPL01TOKEN_PRE	84		4

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## CPLREC02 - Current plan workstation record

Name : DCLCPR02

Function:

This segment declares a current plan workstation record, physically located in EQQCPxDS and EQQNCPDS.

The CPLREC02 record is structured as follows:

- 1 CPLREC02
- 2 common data
- 2 open time interval ( )
- 2 access method ( )

## Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC02	CURRENT PLAN WS RECORD
0	(0)	CHARACTER	236	CPLCOM02	
0	(0)	CHARACTER	19	CPLKEY02	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 02
2	(2)	CHARACTER	4	CPLWSN02	WORKSTATION NAME
6	(6)	CHARACTER	13	CPLKF02	SHOULD CONTAIN BLANKS
19	(13)	CHARACTER	193	CPLBDY02	WS RECORD BODY
19	(13)	CHARACTER	4	CPLYE02	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS02	VERSION NUMBER
24	(18)	CHARACTER	32	CPLDESCR02	WS DESCRIPTION
56	(38)	CHARACTER	12	CPLSUMC	SUM OF COMPLETED OPS
56	(38)	SIGNED	4	CPLSUMC#	NUMBER
60	(3C)	SIGNED	4	CPLSUMCE	ESTIMATED DURATION
64	(40)	SIGNED	4	CPLSUMCR	REAL DURATION
68	(44)	CHARACTER	12	CPLSUMI	SUM OF INTERRUPTED OPS
68	(44)	SIGNED	4	CPLSUMI#	NUMBER
72	(48)	SIGNED	4	CPLSUMIE	ESTIMATED DURATION
76	(4C)	SIGNED	4	CPLSUMIR	REAL DURATION
80	(50)	CHARACTER	8	CPLSUMS	SUM OF STARTED OPS
80	(50)	SIGNED	4	CPLSUMS#	NUMBER
84	(54)	SIGNED	4	CPLSUMSE	ESTIMATED DURATION
88	(58)	CHARACTER	8	CPLSUMR	SUM OF 'READY' OPS (R,A,*)
88	(58)	SIGNED	4	CPLSUMR#	NUMBER
92	(5C)	SIGNED	4	CPLSUMRE	ESTIMATED DURATION
96	(60)	CHARACTER	8	CPLSUMW	SUM OF WAITING OPS
96	(60)	SIGNED	4	CPLSUMW#	NUMBER
100	(64)	SIGNED	4	CPLSUMWE	ESTIMATED DURATION
104	(68)	SIGNED	4	CPLSUMA	SUM OF ARRIVING OPS
108	(6C)	SIGNED	4	CPLSUMNRR	SUM OF '*' READY
112	(70)	SIGNED	4	CPLSUMU	SUM OF UNDECIDED
116	(74)	SIGNED	4	CPLSUME	SUM OF ERROR OPERS
120	(78)	SIGNED	4	CPLSUML	SUM OF LATE OPERS
124	(7C)	CHARACTER	8	CPLCREVT	LAST SYNCHRONIZATION EVENT CREATION TIME
124	(7C)	SIGNED	4	CPLDATE	DATE FORMAT (00YYDDDF)
128	(80)	SIGNED	4	CPLTIME	TIME FORMAT (SECS*100)
132	(84)	SIGNED	4	*(3)	RESERVED FOR DURATION
144	(90)	CHARACTER	1	CPLWSTYP	1=GENERAL 2=COMPUTER 3=PRINT
145	(91)	CHARACTER	1	CPLWSREP	1=AUTO 2=MANUAL 3=MANUAL & COMPLETION ONLY 4=NONREP
146	(92)	CHARACTER	2	CPLWSR1N	RESOURCE NAME
148	(94)	SIGNED	2	CPLWSR1IU#	NUMBER IN USE (NOTE, PS'S ..IN USE = NO. STARTED OP'S
150	(96)	CHARACTER	2	CPLWSR1FLG	RESOURCE INDICATORS
				CPLWSR1C	RESOURCE USED AT CONTROL
				*	FREE
				CPLWSWAIT	WAIT WORKSTATION
				CPLWSVIRT	VIRTUAL WORKSTATION

## CPLREC02 - Current plan workstation record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				CPLWSVIRT	VIRTUAL WORKSTATION
				CPLWSZCAGENT	Z/OS CENTRIC DISTRIBUTED WORKSTATION
				CPLWSZNOINFO	Z-CENTRIC NO INFO AVAILABLE
				CPLWSDYN	DYNAMIC WORKSTATION
150	(96)	BITSTRING	1	*	FREE
152	(98)	CHARACTER	2	CPLWSR2N	RESOURCE NAME
154	(9A)	UNSIGNED	2	CPLWSR2IU#	NUMBER IN USE
156	(9C)	CHARACTER	2	CPLWSR2FLG	RESOURCE INDICATORS
				CPLWSR2C	RESOURCE USED AT CONTROL
				CPLWSSTAT	WSSTAT GENERATED STATUS
				CPLUX009	UX009 GENERATED STATUS
156	(9C)	BITSTRING	1	*	RESERVED
158	(9E)	CHARACTER	1	CPLRLTYP	READY LIST TYPE
159	(9F)	CHARACTER	1	CPLFLG02	FLAG BITS
				CPLPREP	JOB SETUP ABILITY
				CPLIVLNU	IVL NOT USED AT ALL
				CPLIVLNP	NO PARALLEL SERVERS
				CPLSTC	STARTED TASK SUPPORT
				CPLWTO	WTO DEADLINE SUPPORT
				CPLOFF_PEND	WS IS PENDING OFFLINE
				CPLRTR_PEND	T EVENT PENDING
				CPLAWS_VARY	VARIED AWS SET
160	(A0)	CHARACTER	8	CPLPREEV	PREVIOUS EVENT
160	(A0)	CHARACTER	4	CPLPREDT	DATE IN TIME MACRO FORM
164	(A4)	CHARACTER	4	CPLPRETM	TIME IN TIME MACRO FORM
168	(A8)	CHARACTER	8	CPLSUDS	DDNAME OF SUBM./REL DS
176	(B0)	SIGNED	2	CPLIVL#I	NUMBER OF OPEN INTERVALS
178	(B2)	SIGNED	2	CPLMAX15	MAX NO OF EVENTS IN 15 MIN.
180	(B4)	CHARACTER	1	CPLWSSTA	USED BY DIALOG
181	(B5)	CHARACTER	1	CPLCWS_STAT	WORKSTATION STATUS
182	(B6)	SIGNED	2	CPLTRT02	TRANSPORT TIME DEFAULT
184	(B8)	CHARACTER	8	CPLCOFF02	OFFLINE TIME STAMP
184	(B8)	CHARACTER	4	CPLCOFF_DATE	OFFLINE DATE
188	(BC)	CHARACTER	4	CPLCOFF_TIME	OFFLINE TIME
192	(C0)	CHARACTER	4	CPLCAWS02	CURRENT ALTERNATE WS
196	(C4)	UNSIGNED	2	CPLSEQ#02	CURRENT SUBMIT SEQUENCE
198	(C6)	UNSIGNED	1	CPLRSEQ#02	CURRENT REQUEST SEQUENC
199	(C7)	UNSIGNED	1	CPLSUMCES	DURATION FIELDS ABOVE
200	(C8)	UNSIGNED	1	CPLSUMCRS	HOLDS NUMBER OF MINUTES
201	(C9)	UNSIGNED	1	CPLSUMIES	OF ESTIMATED OR REAL
202	(CA)	UNSIGNED	1	CPLSUMIRS	DURATION FOR ALL OPERATIONS
203	(CB)	UNSIGNED	1	CPLSUMSES	ON THIS WORKSTATION PER
204	(CC)	UNSIGNED	1	CPLSUMRES	STATUS (C,I,S,R AND W)
205	(CD)	UNSIGNED	1	CPLSUMWES	HERE ARE THE SECONDS
206	(CE)	CHARACTER	1	CPLWSTWS	FTA WORKSTATION
207	(CF)	CHARACTER	1	CPLLNK02	FTA WS LINKED STATUS
208	(D0)	CHARACTER	1	CPLFLGTWS	FTA SPECIFIC FLAGS
				CPLLNKVA	LINKED STATUS MANUALLY VARIED
				CPLSTAVA	STATUS MANUALLY VARIED
				CPLLNKDW	LINKED DOWN TO CPU
				CPLWRTST	WRITER STATUS FOR CPU

## CPLREC02 - Current plan workstation record

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
				CPLCMDLNK	COMMAND LINK FOR FTW: ON=LINK OFF=UNLINK	
				CPLCMDSTA	COMMAND STATUS FOR FTW: ON=START OFF=STOP	
				CPLFULLNK	FTA WS FULLY LINKED STATUS: ON=FULLY LINKED OFF=NOT FULLY LINKED	
209	(D1)	CHARACTER	1	CPLAUTO	SYSTEM AUTOMATION Y N	
210	(D2)	SIGNED	2	CPLACCM#	0='NO ACC MET DATA' 1='ACC MET DATA PRESENT	
212	(D4)	SIGNED	2	CPLLIMIT	CPU LIMIT VALUE	
214	(D6)	CHARACTER	22	CPLFULLYACT	Y/N	
215	(D7)	CHARACTER	1	CPLRENGT	REMOTE ENGINE TYPE	
216	(D8)	SIGNED	4	CPLVMAX15	MAXNO EVENT IN 15 MIN	
220	(DC)	SIGNED	4	CPLSUMD	SUM OF DELETED OPERATIONS	
224	(E0)	SIGNED	4	CPLSUMH	SUM OF MANUALLY HELD OPERATIONS	
228	(E4)	SIGNED	2	CPLEOPT#	0='NO E2E OPTIONS DATA' 1='E2E OPTIONS PRESENT	
230	(E6)	CHARACTER	6	*	FREE	
236	(EC)	CHARACTER	*	CPLWSVAR	VARIABLE LENGTH SECTION	

### Open time interval segment

The value of CPLIVL#I in the common data segment describes the number of open time interval segments that follow the common data.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
236	(EC)	STRUCTURE	48	CPLIVLOI (*)		
236	(EC)	CHARACTER	10	CPLIVLFR	INTERVAL START	
236	(EC)	CHARACTER	6	CPLIVLFD	DATE YYMMDD	
242	(F2)	CHARACTER	4	CPLIVLFT	TIME HHMM	
246	(F6)	CHARACTER	10	CPLIVLTO	INTERVAL END	
246	(F6)	CHARACTER	6	CPLIVLTD	DATE YYMMDD	
252	(FC)	CHARACTER	4	CPLIVLTT	TIME HHMM	
256	(100)	UNSIGNED	2	CPLIVL#PS	MAX PARALLEL SERVERS	
258	(102)	UNSIGNED	2	CPLIVL#DPPS	SAME, SET AT DAILY PLANNING	
260	(104)	BITSTRING	1	CPLIVLF2	FLAGS	
				CPLIVLMC	IVL SET BY MCP	
				CPLIVLDP	IVL SET BY DP (WSD)	
				*	FREE	
261	(105)	CHARACTER	1	*	FREE	
262	(106)	UNSIGNED	2	CPLIVL#R1	CURRENT RESOURCE CAPACITY	
264	(108)	UNSIGNED	2	CPLIVL#DPR1	CAPACITY SET AT DAILY PLAN	
266	(10A)	UNSIGNED	2	CPLIVL#R2	CURRENT RESOURCE CAPACITY	
268	(10C)	UNSIGNED	2	CPLIVL#DPR2	CAPACITY SET AT DAILY PLAN	
270	(10E)	CHARACTER	4	CPLIVLAWS	ALTERNATE WS NAME	
274	(112)	CHARACTER	4	CPLIVLDPAWS	ALT WS BY DP	
278	(116)	CHARACTER	6	*	FREE	

## CPLREC02 - Current plan workstation record

### Access method segment

You can have the access method segment only if CPLACCM# is greater than 0 in the common data segment.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	72	CPLACC (*)	
0	(0)	CHARACTER	12	CPLACCMN	ACCESS METHOD NAME
12	(C)	CHARACTER	52	CPLADR	SAP HOST ADDRESS
12	(C)	CHARACTER	26	CPLADR1	SAP ADDR 1ST PART
38	(26)	CHARACTER	26	CPLADR2	SAP ADDR 2ND PART
64	(40)	SIGNED	4	CPLPORT	SAP PORT NUMBER
68	(44)	CHARACTER	4	*	FREE

### E2E Options Data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	175	CPLEOPT (*)	
0	(0)	CHARACTER	47	CPLEOJU	DEFAULT JOB USER
47	(2F)	CHARACTER	1	CPLEOJP	DEFAULT JOB PASSWORD
48	(30)	CHARACTER	40	CPLEOJT	DEFAULT JOB PASSWORD
88	(58)	CHARACTER	1	CPLEOBR	IS A BROKER (Y/N)
89	(59)	CHARACTER	40	CPLEOPL	BROKER POOL
129	(81)	CHARACTER	40	CPLEODP	BROKER DYNAMIC POOL
169	(A9)	CHARACTER	7	*	FREE

### Cross reference

Name	Hex Offset	Hex Value	Level
CPLACC	0		1
CPLACCM#	D2		4
CPLACCMN	0		2
CPLADR	C		2
CPLADR1	C		3
CPLADR2	26		3
CPLAUTO	D1		4
CPLAWS_VARY	9F	01	5
CPLBDY02	13		3
CPLCAWS02	C0		4
CPLCMDLNK	D0	08	5
CPLCMDSTA	D0	04	5
CPLCOFF_DATE	B8		5
CPLCOFF_TIME	BC		5
CPLCOFF02	B8		4
CPLCOM02	0		2
CPLCREVT	7C		4
CPLCWS_STAT	B5		4
CPLDATE	7C		5
CPLDESCR02	18		4
CPLEOBR	58		2

## CPLREC02 - Current plan workstation record

Name	Hex Offset	Hex Value	Level
CPLEODP	81		2
CPLEOJP	2F		2
CPLEOJT	30		2
CPLEOJU	0		2
CPLEOPL	59		2
CPLEOPT	0		1
CPLEOPT#	E4		4
CPLEYE02	13		4
CPLFLGTWS	D0		4
CPLFLG02	9F		4
CPLFULLNK	D0	02	5
CPLFULLYACT	D6		4
CPLIVL#DPPS	102		2
CPLIVL#DPR1	108		2
CPLIVL#DPR2	10C		2
CPLIVL#I	B0		4
CPLIVL#PS	100		2
CPLIVL#R1	106		2
CPLIVL#R2	10A		2
CPLIVLAWS	10E		2
CPLIVLDP	104	40	3
CPLIVLDPAWS	112		2
CPLIVLFD	EC		3
CPLIVLFR	EC		2
CPLIVLFT	F2		3
CPLIVLF2	104		2
CPLIVLMC	104	80	3
CPLIVLNP	9F	20	5
CPLIVLNU	9F	40	5
CPLIVLOI	EC		1
CPLIVLTD	F6		3
CPLIVLTO	F6		2
CPLIVLTT	FC		3
CPLKEY02	0		3
CPLKF02	6		4
CPLLIMIT	D4		4
CPLLNKDW	DO	20	5
CPLLNKVA	D0	80	5
CPLLNK02	CF		4
CPLMAX15	B2		4
CPLOFF_PEND	9F	04	5
CPLPORT	40		2
CPLPREDT	A0		5
CPLPREEV	A0		4
CPLPREP	9F	80	5
CPLPRETM	A4		5
CPLREC02	0		1
CPLRENGT	D7		4
CPLRLTYP	9E		4
CPLRSEQ#02	C6		4
CPLRTR_PEND	9F	02	5

## CPLREC02 - Current plan workstation record

Name	Hex Offset	Hex Value	Level
CPLSSEQ#02	C4		4
CPLSTAVA	D0	40	5
CPLSTC	9F	10	5
CPLSUDS	A8		4
CPLSUMA	68		4
CPLSUMC	38		4
CPLSUMC#	38		5
CPLSUMCE	3C		5
CPLSUMCES	C7		4
CPLSUMCR	40		5
CPLSUMCRS	C8		4
CPLSUMD	DC		4
CPLSUME	74		4
CPLSUMH	EO		4
CPLSUMI	44		4
CPLSUMI#	44		5
CPLSUMIE	48		5
CPLSUMIES	C9		4
CPLSUMIR	4C		5
CPLSUMIRS	CA		4
CPLSUML	78		4
CPLSUMNRR	6C		4
CPLSUMR	58		4
CPLSUMR#	58		5
CPLSUMRE	5C		5
CPLSUMRES	CC		4
CPLSUMS	50		4
CPLSUMS#	50		5
CPLSUMSE	54		5
CPLSUMSES	CB		4
CPLSUMU	70		4
CPLSUMW	60		4
CPLSUMW#	60		5
CPLSUMWE	64		5
CPLSUMWES	CD		4
CPLSUMX	84		4
CPLTIME	80		5
CPLTRT02	B6		4
CPLUX009	9C	20	5
CPLVERS02	17		4
CPLVMAX15	D8		4
CPLWRTST	D0	10	5
CPLWSDYN	96	02	5
CPLWSN02	2		4
CPLWSREP	91		4
CPLWSR1C	96	80	5
CPLWSR1FLG	96		4
CPLWSR1IU#	94		4
CPLWSR1N	92		4
CPLWSR2C	9C	80	5
CPLWSR2FLG	9C		4



## CPLREC02 - Current plan workstation record

Name	Hex Offset	Hex Value	Level
CPLWSR2IU#	9A		4
CPLWSR2N	98		4
CPLWSSTA	B4		4
CPLWSSTAT	9C	40	5
CPLWSTWS	CE		4
CPLWSTYP	90		4
CPLWSVAR	EC		2
CPLWSVIRT	96	10	5
CPLWSWAIT	96	20	5
CPLWSZCAGENT	96	08	5
CPLWTO	9F	08	5

## CPLREC04 - Current plan job name table record

Name : DCLCPR04

Function:

This segment declares a jobname table record, physically located in EQQCPxDS and EQQNCPDS. The CPLREC04 record is structured as follows:

- 1 CPLREC04
  - 2 common data
  - 2 jnt entries ( )
  - 2 step entries ( )

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC04	JOBNAME TABLE RECORD
0	(0)	CHARACTER	19	CPLKEY04	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 04
2	(2)	CHARACTER	8	CPLJOB04	JOBNAME
10	(A)	CHARACTER	5	CPLLOT04	LATEST OUT OF CPU OP
10	(A)	UNSIGNED	1	CPLLUY04	YEAR
11	(B)	UNSIGNED	1	CPLLUM04	MONTH
12	(C)	UNSIGNED	1	CPLLUD04	DAY
13	(D)	SIGNED	2	CPLLUI04	TIME IN MIN. (HH*100+MM)
15	(F)	CHARACTER	4	CPLCID04	CPU OPERATION IDENTIFICAT-N
15	(F)	UNSIGNED	3	CPLCOC04	OCCURRENCE NUMBER
18	(12)	UNSIGNED	1	CPLCOP04	OPERATION NUMBER
19	(13)	CHARACTER	77	CPLBDY04	BODY OF JOBNAME TABLE
19	(13)	CHARACTER	4	CPLYEY04	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS04	VERSION NUMBER
24	(18)	SIGNED	2	CPLASID04	ASID
26	(1A)	SIGNED	2	CPLNET04	NETWORK ID
28	(1C)	CHARACTER	8	CPLJES04	JES2 OR JES3 JOB ID
36	(24)	SIGNED	4	CPLRDD04	SMF READER DATE
40	(28)	SIGNED	4	CPLRDT04	SMF READER TIME
44	(2C)	SIGNED	4	CPL#RC04	NUMBER OF JNT ENTRIES
48	(30)	CHARACTER	1	CPLJST04	JOB STATUS H=HELD, Q=ONQUE
49	(31)	CHARACTER	1	CPLSYS04	SYSTEM A=JES2, B=JES3
50	(32)	CHARACTER	1	CPLFLG04	STATUS FLAGS
				CPLAJR04	ON = RELEASE JOB IF HELD

## CPLREC04 - Current plan job name table record

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				*	DO NOT USE
				CPLERR04	ON = ERROR MESSAGE ISSUED
				CPLTJT04	ON=CPU OP IS TIME JOB
				CPLAEC04	ON=AUTOMATIC ERROR COMPL.
				CPL3SJ04	ON=JOB HAS ENDED
				CPL2EV04	ON=JOB HAS STARTED
				CPLSOO04	SUBMITTED OUTSIDE THE SCHEDULER
51	(33)	CHARACTER	1	CPLFLG042	MORE STATUS FLAGS
				CPLAJS04	ON = AUTOMATIC SUBMIT OFF= DO NOT SUBMIT
				CPLOTO04	ON = OVERRIDE TRACK OPTION IN EV.MATCHING
				CPLRST04	JOB HAS BEEN RESTARTED
				CPLODL04	CORRESP OPER DELETED
				CPLSPO04	SPIN OFF DS SENT ON NJE
				CPLPUR04	B5 EVENT SKIPPED
				CPLNJ#04	NO JOBNUMBER FROM EXI
				CPLASET04	ERRRES IN ACTION
52	(34)	BITSTRING	1	CPLFLG043	FLAGS
				CPLWRER04	ON=CPU OP REROUTED
				CPLRERUT04	ON=CPU OP REROUTEABLE
				CPLDIRER04	ON=INST PARM REREOTE
				CPLRESTA04	ON=CPU OP RESTARTABLE
				CPLDIRES04	ON=INST PARM RESTART
				CPLRDR04	SAME JOBNAME/RDR TIME
				CPLETT04	ADDED VIA ETT
				*	RESERVED
53	(35)	CHARACTER	1	*	RESERVED
54	(36)	SIGNED	2	CPLGMT04	GMT OFFSET FOR RDR EVT
56	(38)	SIGNED	4	CPLORG04	NJE ORIGIN JOB NUMBER
60	(3C)	CHARACTER	8	CPLSUB04	SUBMIT DATE AND TIME
60	(3C)	CHARACTER	4	CPLSUD04	DATE (FORMAT 00YYDDDF)
64	(40)	CHARACTER	4	CPLSUT04	TIME (FORMAT 100*SECS)
68	(44)	CHARACTER	4	CPLERC04	ER CODE FROM 3SJ EVENT
72	(48)	SIGNED	4	CPL#SC04	NO. STEP COMP. ENTRIES
76	(4C)	SIGNED	4	CPLABN04	INDEX OF ABENDING STEP
80	(50)	BITSTRING	1	CPLARB04	
				CPLARF04	AUTO RECOVER, 1ST TIME
				CPLBSN04	IMPROPER STEP NAMING
				CPLMAS04	FOR TERMINATING STEP
				CPLMSS04	ALL FOR A JS REC. STEP
				CPLMIS04	AT LEAST ONE
				CPLSND04	STEP END ENTRY AVAILABLE
				CPLEOSYS04	ERROR SET BY WS FAIL
				CPLEOFFL04	ERROR SET BY WS OFFL
81	(51)	CHARACTER	8	CPLNOD04	CURRENT NJE NODE NAME
89	(59)	CHARACTER	4	CPLAWS04	REROUTED ALT WS NAME
93	(5D)	CHARACTER	1	*	STEP EVENTS
				CPLSNZ04	STEP EVENTS NZERO FLAG
				CPLSTALL04	STEPEVENTS(ALL)
				CPLWLMAR	ALREADY HPWLM CLASS RQ
				*	FREE
94	(5E)	SIGNED	2	CPLARSTE04	AR RESTART STEP NUMBER

## CPLREC04 - Current plan job name table record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
96	(60)	CHARACTER	*	CPLVAR04	VARIABLE PART OF RECORD

### JNT entries segment

The value of CPL#RC04 in the common data segment describes the number of JNT entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
96	(60)	STRUCTURE	*	CPLENS04	JNT ENTRIES
96	(60)	CHARACTER	20	CPLENT04 (*)	JNT ENTRY
96	(60)	CHARACTER	4	CPLWSN04	WORKSTATION NAME
100	(64)	CHARACTER	4	CPLOPX04	INDEX TO OPER RECORD
100	(64)	UNSIGNED	3	CPLOCC04	OCC NUMBER
103	(67)	UNSIGNED	1	CPLOP04	OPERATION NUMBER
104	(68)	CHARACTER	1	CPLCLS04	JOB OR SYSOUTCLASS
105	(69)	CHARACTER	8	CPLFRM04	FORMNUMBER (PRINT WS)
105	(69)	CHARACTER	8	CPLNJE04	ORIGIN NJE NODE (CPU WS)
113	(71)	CHARACTER	1	CPLOST04	OPERATION STATUS
114	(72)	CHARACTER	2	*	FREE

### Step entries segment

The value of CPL#SC04 in the common data segment describes the number of step entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLSTP04	
0	(0)	CHARACTER	20	CPLSMF04 (*)	
0	(0)	CHARACTER	8	CPLSCP04	NAME OF STEP CALLING PROC.
				*	RESERVED
				CPLSUR04	POSITIVE IDENTIFICATION
8	(8)	CHARACTER	8	CPLPSN04	PROCEDURE STEP NAME
16	(10)	CHARACTER	4	CPLSCC04	STEP COMPLETION CODE FROM SMF KEPT HERE UNTIL JOB ENDS. IT HAS THE FOLLOWING FORMAT:
					'SXXX' (SYSTEM ABEND)
					'UXXX' (USER ABEND)
					'FLSH' (STEP FLUSHED)
					'XXXX' (RETURN CODE)

## CPLREC04 - Current plan job name table record

### Cross reference

Name	Hex Offset	Hex Value	Level
CPL#RC04	2C		3
CPL#SC04	48		3
CPLABN04	4C		3
CPLAEC04	32	08	4
CPLAJR04	32	80	4
CPLAJS04	33	80	4
CPLARB04	50		3
CPLARF04	50	80	4
CPLARSTE04	5E		3
CPLASET04	33	01	4
CPLASID04	18		3
CPLAWS04	59		3
CPLBDY04	13		2
CPLBSN04	50	40	4
CPLCID04	F		3
CPLCLS04	68		3
CPLCOC04	F		4
CPLCOP04	12		4
CPLDIRER04	34	20	4
CPLDIRES04	34	08	4
CPLENS04	60		1
CPLENT04	60		2
CPLEOFFL04	50	01	4
CPLEOSYS04	50	02	4
CPLERC04	44		3
CPLERR04	32	20	4
CPLETT04	34	02	4
CPLEYE04	13		3
CPLFLG04	32		3
CPLFLG042	33		3
CPLFLG043	34		3
CPLFRM04	69		3
CPLGMT04	36		3
CPLJES04	1C		3
CPLJOB04	2		3
CPLJST04	30		3
CPLKEY04	0		2
CPLLUD04	C		4
CPLLUI04	D		4
CPLLUM04	B		4
CPLLUT04	A		3
CPLLUY04	A		4
CPLMAS04	50	20	4
CPLMIS04	50	08	4
CPLMSS04	50	10	4
CPLNET04	1A		3
CPLNJ#04	33	02	4
CPLNJE04	69		4
CPLNOD04	51		3

## CPLREC04 - Current plan job name table record

Name	Hex Offset	Hex Value	Level
CPLOCC04	64		4
CPLODL04	33	10	4
CPLOPX04	64		3
CPLOP04	67		4
CPLORG04	38		3
CPLOST04	71		3
CPLOTO04	33	40	4
CPLPSN04	8		3
CPLPUR04	33	04	4
CPLRDD04	24		3
CPLRDR04	34	04	4
CPLRDT04	28		3
CPLREC04	0		1
CPLRERUT04	34	40	4
CPLRESTA04	34	10	4
CPLRST04	33	20	4
CPLSCC04	10		3
CPLSCP04	0		3
CPLSMF04	0		2
CPLSND04	50	04	4
CPLSNZ04	5D	80	4
CPLSOO04	32	01	4
CPLSPO04	33	08	4
CPLSTALL04	5D	40	4
CPLSTP04	0		1
CPLSUB04	3C		3
CPLSUD04	3C		4
CPLSUR04	0	40	4
CPLSUT04	40		4
CPLSYS04	31		3
CPLIJT04	32	10	4
CPLVAR04	60		2
CPLVERS04	17		3
CPLWLMAR	5D	20	4
CPLWRER04	34	80	4
CPLWSN04	60		3
CPL2EV04	32	02	4
CPL3SJ04	32	04	4

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## CPLREC05 - Current plan application index record

Name : DCLCPR05

Function:

This segment declares an application index record, physically located in EQQCPxDS and EQQNCPPDS.

The CPLREC05 record is structured as follows:

- 1 CPLREC05
  - 2 common data
  - 2 occurrence entries ( )

## CPLREC05 - Current plan application index record

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC05	AD ID INDEX RECORD
0	(0)	CHARACTER	19	CPLKEY05	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 05
2	(2)	CHARACTER	16	CPLAID05	APPLICATION
18	(12)	UNSIGNED	1	CPLSEQ05	CP05 SEQUENCE NUMBER 0 = INDEX CP05 RECORDS
19	(13)	CHARACTER	*	CPLBDY05	BODY OF AD ID INDEX RECORD
19	(13)	CHARACTER	4	CPLEYE05	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS05	VERSION NUMBER
24	(18)	SIGNED	2	CPL#OC05	NUMBER OF OCCURRENCES IF CPLSEQ05=0, NUMBER OF RECORDS WITH THE SAME APPL ID
26	(1A)	CHARACTER	6	*	FREE
32	(20)	CHARACTER	*	CPLVAR05	VARIABLE PART OF RECORD

### Occurrence entries segment

The value of CPL#OC05 in the common data segment describes the number of occurrence entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLOCS05	OCCURRENCES DATA
0	(0)	CHARACTER	32	CPLOCC05 (*)	OCCURRENCE DATA
0	(0)	CHARACTER	10	CPLIA05	INPUT ARRIVAL
0	(0)	CHARACTER	6	CPLIAD05	DATE
6	(6)	CHARACTER	4	CPLIAT05	TIME
10	(A)	CHARACTER	10	CPLADL05	ACTUAL COMPLETION   DELETION
10	(A)	CHARACTER	6	CPLDLD05	DATE   BLANK
16	(10)	CHARACTER	4	CPLDLT05	TIME   0000
20	(14)	UNSIGNED	3	CPLOCX05	OCCURRENCE NUMBER
23	(17)	SIGNED	2	CPLNET05	NETWORK ID
25	(19)	CHARACTER	1	CPLSTA05	OCCURRENCE STATUS U = UNDECIDED W = WAITING S = STARTED E = ENDED IN ERROR C = COMPLETED D = DELETED P = PENDING PREDECESSOR
26	(1A)			CPLCLT05	1 MEANS ALREADY MARKED.. ..COMPLETE ON LTP
				CPLMCP05	1 MEANS ADDED BY MCP
				CPLIAM05	1 MEANS IA MODIFIED BY MCP
				CPLCFR05	1 MEANS COPIED FOR REPORT
				*	FREE

## CPLREC05 - Current plan application index record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
27	(1B)	CHARACTER	1	CPLOCA05	D MEANS ADDED BY MCP- DIALOG E MEANS ADDED BY ETT P MEANS ADDED BY PIF A MEANS ADDED BY AR BLANK MEANS DP
28	(1C)	CHARACTER	1	CPLOCDB2	Y = ADDED TO DB2
29	(1D)	CHARACTER	1	CPLCP16AD	Y = ADDED TO CP16
30	(1E)	CHARACTER	2	*	FREE

### Occurrence entries index segment

If CPLSEQ05=0 in the common data segment, CPL#OC05 contains the number of CP05 records with the same value as in CPLAID05.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLIDX05	INDEX RECORD ENTRY
0	(0)	CHARACTER	32	CPLOCCX05	SINGLE CP05 RECORDS INDEX
0	(0)	CHARACTER	10	CPLFIA05	FIRST INPUT ARRIVAL
0	(0)	CHARACTER	6	CPLFIAD05	DATE
6	(6)	CHARACTER	4	CPLFIAT05	TIME
10	(A)	CHARACTER	10	CPLLIA05	LAST INPUT ARRIVAL
10	(A)	CHARACTER	6	CPLLIAD05	DATE
16	(10)	CHARACTER	4	CPLLIAT05	TIME
20	(14)	SIGNED	2	CPLOCN05	OCCURRENCE NUMBER
22	(16)	CHARACTER	10	*	RESERVED

### Cross reference

Name	Hex Offset	Hex Value	Level
CPL#OC05	18		3
CPLADL05	A		3
CPLAID05	2		3
CPLBDY05	13		2
CPLCFR05	1A	10	3
CPLCLT05	1A	80	3
CPLCP16AD	1D		3
CPLDLD05	A		4
CPLDLT05	10		4
CPLEYE05	13		3
CPLFIAD05	0		4
CPLFIAT05	6		4
CPLFIA05	0		3
CPLIAD05	0		4
CPLIAM05	1A	20	3
CPLIAT05	6		4
CPLIA05	0		3
CPLIDX05	0		1
CPLKEY05	0		2
CPLLIAD05	A		4

## CPLREC05 - Current plan application index record

Name	Hex Offset	Hex Value	Level
CPLLIAT05	10		4
CPLLIA05	A		3
CPLMCP05	1A	40	3
CPLNET05	17		3
CPLOCA05	1B		3
CPLOCC05	0		2
CPLOCDB2	1C		3
CPLOCS05	0		1
CPLOCX05	14		3
CPLREC05	0		1
CPLSEQ05	12		3
CPLSTA05	19		3
CPLVAR05	20		3
CPLVERS05	17		3

## CPLREC06 - Current plan remaining slack record

Name : DCLCPR06

Function:

This segment declares the remaining slack record, physically located in EQQCPxDS and EQQNCPDS.

The CPLREC06 record is structured as follows:

- 1 CPLREC06
  - 2 common data
  - 2 occurrence entries ( )

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	26	CPLREC06	REMAINING SLACK CHAIN REC
0	(0)	CHARACTER	19	CPLKEY06	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 06
2	(2)	SIGNED	2	CPLSEQ06	REM SLACK CHAIN REC NUMBER
4	(4)	CHARACTER	15	CPLKF06	FILLER, CONTAINS BLANKS
19	(13)	CHARACTER	7	CPLBDY06	BODY OF REM. SLACK RECORD
19	(13)	CHARACTER	4	CPLYE06	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS06	VERSION NUMBER
24	(18)	SIGNED	2	CPL#OC06	NUMBER OF ENTRIES IN REC
26	(1A)	CHARACTER		CPLVAR06	VARIABLE PART OF RECORD

### Occurrence entries segment

The value of CPL#OC06 in the common data segment describes the number of occurrence entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLOCS06	OCCURRENCE ENTRIES
0	(0)	CHARACTER	16	CPLOCC06 (*)	OCCURRENCE ENTRY
0	(0)	UNSIGNED	3	CPLOCX06	OCCURRENCE RECORD INDEX



## CPLREC06 - Current plan remaining slack record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
3	(3)	SIGNED	2	CPLNET06	NETWORK ID
5	(5)	CHARACTER	1	CPLSTA06	OCCURRENCE STATUS BLANK = NONCOMPLETED C = COMPLETED D = DELETED
3 CHAR(1), FILLER					
6	(6)	CHARACTER	10	CPLLO06	EARLIEST LATEST STA IN OCC
6	(6)	CHARACTER	6	CPLLOD06	DATE
12	(C)	CHARACTER	4	CPLLOT06	TIME

### Cross reference

Name	Hex Offset	Hex Value	Level
CPL#OC06	18		3
CPLBDY06	13		2
CPLEYE06	13		3
CPLKEY06	0		2
CPLKF06	4		3
CPLLOD06	6		4
CPLLOT06	C		4
CPLLO06	6		3
CPLNET06	3		3
CPLOCC06	0		2
CPLOCS06	0		1
CPLOCX06	0		3
CPLREC06	0		1
CPLSEQ06	2		3
CPLSTA06	5		3
CPLVAR06	1A		3
CPLVERS06	17		3

---

## CPLREC07 - Current plan undecided operation record

Name : DCLCPR07

Function:

This segment declares an undecided operation record, physically located in EQQCPxDS and EQQNCPDS.

The CPLREC07 record is structured as follows:

- 1 CPLREC07
- 2 common data
- 2 occurrence entries ( )

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC07	UNDECIDED OCC. RECORD
0	(0)	CHARACTER	19	CPLKEY07	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 07
2	(2)	SIGNED	2	CPLSEQ07	UNDECIDED OCC: REC NUMBER
4	(4)	CHARACTER	15	CPLKF07	FILLER CONTAINS BLANKS

## CPLREC07 - Current plan undecided operation record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
19	(13)	CHARACTER	*	CPLBDY07	BODY OF UNDECIDED REC
19	(13)	CHARACTER	4	CPLYE07	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS07	VERSION NUMBER
24	(18)	SIGNED	2	CPL#OC07	NUMBER OF ENTRIES IN REC
26	(1A)	CHARACTER	*	CPLVAR07	VARIABLE PART OF RECORD

## Occurrence entries segment

The value of CPL#OC07 in the common data segment describes the number of occurrence entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLOCS07	OCCURRENCE ENTRIES
0	(0)	CHARACTER	56	CPLOCC07 (*)	OCCURRENCE ENTRY
0	(0)	CHARACTER	16	CPLAID07	APPLICATION ID
16	(10)	CHARACTER	10	CPLIA07	INPUT ARRIVAL (FINAL)
16	(10)	CHARACTER	6	CPLIAD07	DATE
22	(16)	CHARACTER	4	CPLIAT07	TIME
26	(1A)	CHARACTER	24	CPLJXT07	DESCRIPTIVE TEXT
50	(32)	UNSIGNED	3	CPLOCX07	OCCURRENCE RECORD INDEX
53	(35)	SIGNED	2	CPLNET07	NETWORK ID
55	(37)	CHARACTER	1	CPLSTA07	OCCURRENCE STATUS U = UNDECIDED D = DELETED W = WAITING

## Cross reference

Name	Hex Offset	Hex Value	Level
CPL#OC07	18		3
CPLAID07	0		3
CPLBDY07	13		2
CPLYE07	13		3
CPLIAD07	10		4
CPLIAT07	16		4
CPLIA07	10		3
CPLJXT07	1A		3
CPLKEY07	0		2
CPLKF07	4		3
CPLNET07	35		3
CPLOCC07	0		2
CPLOCS07	0		1
CPLOCX07	32		3
CPLREC07	0		1
CPLSEQ07	2		3
CPLSTA07	37		3
CPLVAR07	1A		3
CPLVERS07	17		3

## CPLREC08 - Current plan ended-in-error record

Name : DCLCPR08

Function:

This segment declares the ended-in-error record, physically located in EQQCPxDS and EQQNCPDS.

The CPLREC08 record is structured as follows:

- 1 CPLREC08
- 2 common data
- 2 ended-in-error entries ( )

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC08	ENDED IN ERROR RECORD
0	(0)	CHARACTER	19	CPLKEY08	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 08
2	(2)	SIGNED	2	CPLSEQ08	ERROR RECORD NUMBER
4	(4)	BITSTRING	2	CPLIND08	
				CPLARR08	AUTO RECOVERY REQUEST
				CPLARM08	AUTO RECOVERY REQUEST
				CPLNPP08	ON: AUTO RECOVERY NOT POSTPONED
19	(13)	CHARACTER	*	CPLBDY08	BODY OF ERROR RECORD
19	(13)	CHARACTER	4	CPLYE08	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS08	VERSION NUMBER
24	(18)	SIGNED	2	CPL#OP08	NUMBER OF ENTRIES IN REC
26	(1A)	CHARACTER	*	CPLVAR08	VARIABLE PART OF RECORD

### Ended-in-error entry segment

The value of CPL#OC08 in the common data segment describes the number of ended-in-error entry segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLOPS08	INDEXES TO OD RCDS IN ERROR
0	(0)	CHARACTER	6	CPLENT08 (*)	ENDED-IN-ERROR ENTRY
0	(0)	CHARACTER	4	CPLOPX08	INDEX TO OP RECORD
0	(0)	UNSIGNED	3	CPLOCX08	OCC NUMBER
3	(3)	UNSIGNED	1	CPLOP#08	OPERATION NUMBER A ZERO ENTRY MEANS OP NOT ENDED IN ERROR ANYMORE
4	(4)	BITSTRING	2	CPLIND08	
				CPLARR08	AUTO RECOVERY REQUEST
				CPLARM08	AUTO RECOVERY REQUEST
4	(4)	BITSTRING	1	*	FOR FUTURE USE

### Cross reference

Name	Hex Offset	Hex Value	Level
CPL#OP08	18		3

## CPLREC08 - Current plan ended-in-error record

Name	Hex Offset	Hex Value	Level
CPLARM08	4	40	4
CPLARR08	4	80	4
CPLBDY08	13		2
CPLENT08	0		2
CPLEYE08	13		3
CPLIND08	4		3
CPLKEY08	0		2
CPLKF08	4		3
CPLNPP08	4	20	4
CPLOCX08	0		4
CPLOP#08	3		4
CPLOPS08	0		1
CPLOPX08	0		3
CPLREC08	0		1
CPLSEQ08	2		3
CPLVAR08	1A		3
CPLVERS08	17		3

## CPLREC09 - Current plan rerun record

Name : DCLCPR09

Function:

This segment declares the rerun operation record, physically located in EQQCPxDS and EQQNCPDS.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	328	CPLREC09	RERUN OPERATION RECORD
0	(0)	CHARACTER	12	CPLKEY09	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 09
2	(2)	UNSIGNED	3	CPLOCC09	OCC NUMBER
5	(5)	UNSIGNED	1	CPLOP09	OPERATION NUMBER
6	(6)	SIGNED	2	CPLRR#09	RERUN NUMBER
8	(8)	CHARACTER	4	CPLKF09	ALWAYS BLANKS
12	(C)	CHARACTER	174	CPLBDY09	CP3P BOBY

## Cross reference

Name	Hex Offset	Hex Value	Level
CPLBDY09	C		2
CPLKEY09	0		2
CPLKF09	8		3
CPLOCC09	2		3
CPLOP09	5		3
CPLREC09	0		1
CPLRR#09	6		3

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## CPLREC10 - Current plan workstation activity record

Name : DCLCPR10

### Function:

This segment declares the workstation activity record, physically located in EQQCPxDS and EQQNCPDS.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	216	CPLREC10	WS ACTIVITY RECORD
0	(0)	CHARACTER	19	CPLKEY10	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 10
2	(2)	CHARACTER	4	CPLWSN10	WSID
6	(6)	CHARACTER	6	CPLDAY10	DATE
12	(C)	CHARACTER	7	*	SHOULD ALWAYS BE BLANKS
19	(13)	CHARACTER	197	CPLBDY10	RECORD BODY
19	(13)	CHARACTER	4	CPLEYE10	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS10	VERSION NUMBER
24	(18)	CHARACTER	2	CPL#OP10 (96)	NUMBER OF PARALLELL OPS PER 15 MINUTES

## Cross reference

Name	Hex Offset	Hex Value	Level
CPL#OP10	18		3
CPLBDY10	13		2
CPLDAY10	6		3
CPLEYE10	13		3
CPLKEY10	0		2
CPLREC10	0		1
CPLVERS10	17		3
CPLWSN10	2		3

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## CPLREC11 - Current plan ready list record

Name : DCLCPR11

### Function:

This segment declares a ready list record, physically located in EQQCPxDS and EQQNCPDS.

The CPLREC11 record is structured as follows:

- 1 CPLREC11
- 2 common data
- 2 ready operation entries ( )

## Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC11	READY LIST RECORD
0	(0)	CHARACTER	19	CPLKEY11	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 11

## CPLREC11 - Current plan ready list record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
2	(2)	CHARACTER	2	CPLLST11	'01' FOR READY LIST '02' FOR WAITING LIST
4	(4)	CHARACTER	4	CPLWSN11	WS NAME
8	(8)	SIGNED	2	CPLSEQ11	SEQUENCE NUMBER
10	(A)	CHARACTER	9	CPLKF11	FILLER CONTAINS BLANKS
19	(13)	CHARACTER	*	CPLBDY11	READY LIST RECORD BODY
19	(13)	CHARACTER	4	CPLEYE11	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS11	VERSION NUMBER
24	(18)	SIGNED	2	CPL#DO11	NO OF ENTRIES
26	(1A)	CHARACTER	*	CPLVAR11	VARIABLE PART OF RECORD

## Ready operation entries segment

The value of CPL#DO11 in the common data segment describes the number of ready operation entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLDOS11	DOA ENTRIES
0	(0)	CHARACTER	4	CPLDOA11 (*)	DOA ENTRY
0	(0)	UNSIGNED	3	CPLOCX11	OCC NUMBER
3	(3)	UNSIGNED	1	CPLOPX11	OPERATION NUMBER

## Cross reference

Name	Hex Offset	Hex Value	Level
CPL#DO11	18		3
CPLBDY11	13		2
CPLDOA11	0		2
CPLDOS11	0		1
CPLEYE11	13		3
CPLKEY11	0		2
CPLKF11	A		3
CPLLST11	2		3
CPLOCX11	0		3
CPLOPX11	3		3
CPLREC11	0		1
CPLSEQ11	8		3
CPLVAR11	1A		3
CPLVERS11	17		3
CPLWSN11	4		3

## CPLREC12 - Current plan potential predecessor record

Name : DCLCPR12

### Function:

This segment declares a potential predecessor record, physically located in EQQCPxDS and EQQNCPDS. Each record defines application names and operation numbers for operations that could become external successors to new occurrences added to the plan by MCP functions.

The CPLREC12 record is structured as follows:

- 1 CPLREC12
  - 2 common data
  - 2 potential predecessors ( )

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	32	CPLREC12	POTENTIAL PREDECESSOR RECORD
0	(0)	CHARACTER	19	CPLKEY12	
0	(0)	CHARACTER	2	*	RECORD TYPE IS ALWAYS 12
2	(2)	CHARACTER	16	CPLAPRE12	APPLICATION NAME
18	(12)	CHARACTER	1	*	BLANK
19	(13)	CHARACTER	13	CPLBDY12	BODY OF PREDECESSOR RECORD
19	(13)	CHARACTER	4	CPLEYE12	EYECATCHER
23	(17)	UNSIGNED	1	CPLVERS12	VERSION NUMBER
24	(18)	SIGNED	2	CPLNUM12	NUMBER OF SUCC ENTRIES
26	(1A)	BITSTRING	1	CPLFLAGS12	CP12 FLAGS
		1... ....		CPLCOND12	
		.1.. ....		*	FREE
27	(1B)	CHARACTER	5	*	FREE
32	(20)	CHARACTER		CPLVAR12	START OF SUCCESSOR ENTRIES

### Potential predecessor segment

The value of CPLNUM12 in the common data segment describes the number of potential predecessor segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	24	CPLENT12	POTENTIAL SUCCESSOR ENTRY
0	(0)	SIGNED	2	CPLPRE12	PREDECESSOR OPERATION NUMBER
2	(2)	SIGNED	2	CPLSUC12	SUCCESSOR OPERATION NUMBER
4	(4)	CHARACTER	16	CPLASUC12	SUCCESSOR APPLICATION NAME
20	(14)	BITSTRING	1	CPLFLG12	WORK FLAGS
		1... ....		CPLMAT12	MATCH FOUND IN MCP ADD
		.1.. ....		*	FREE
21	(15)	CHARACTER	3	*	FREE

### Cross reference

Name	Hex Offset	Hex Value	Level
CPLAPRE12	2		3
CPLASUC12	4		2

## CPLREC12 - Current plan potential predecessor record

Name	Hex Offset	Hex Value	Level
CPLBDY12	13		2
CPLCOND12	1A	80	4
CPLENT12	0		1
CPLEYE12	13		3
CPLFLAGS12	1A		3
CPLFLG12	14		2
CPLKEY12	0		2
CPLMAT12	14	80	3
CPLNUM12	18		3
CPLPRE12	0		2
CPLREC12	0		1
CPLSUC12	2		2
CPLVAR12	20		3
CPLVERS12	17		3

## CPLREC14 - Current plan job log staging and status record

Name : DCLCPR14

Function:

This segment declares a job log staging and status record, physically located in eqqcpdxs and eqqncpds.

The CPLREC14 record is structured as follows:

- 1 CPLREC14
  - 2 common data
  - 2 message line entries ( )

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	111	CPLREC14	SYSOUT FORM JOBLOG
0	(0)	CHARACTER	8	CPL14KEY	KEY OF RECORD
0	(0)	CHARACTER	2	CPLTYP14	RECORD TYPE (14)
2	(2)	UNSIGNED	3	CPLOCC14	OCC NUMBER IN CP
5	(5)	UNSIGNED	1	CPLOPR14	OPERATION NUMBER
6	(6)	SIGNED	2	CPLSEQ14	SEQUENCE NUMBER, 1ST = 0001
8	(8)	CHARACTER	81	CPL14BDY	
8	(8)	CHARACTER	12	*	
20	(14)	CHARACTER	4	CPL14EYE	EYE CATCHER
24	(18)	CHARACTER	4	CPL14WSN	WORK STATION NAME
28	(1C)	CHARACTER	8	CPL14JNM	JOB NAME
36	(24)	CHARACTER	8	CPL14JID	JOB ID
44	(2C)	ADDRESS	4	CPLTOTSZ	TOTAL SIZE OF RECORD , BEFORE SPLIT INTO TWO OR MORE, AND BEFORE COMPRESSION
48	(30)	SIGNED	4	CPLSIZ14	SIZE OF RECORD WHEN IN CP
48	(30)	SIGNED	4	CPL14CSZ	COMPRESSED SIZE (INCL HEADER)
52	(34)	SIGNED	4	CPLLO14	OFFSET TO LAST MESSAGE LINE
56	(38)	SIGNED	4	CPL#LINE	NUMBER OF JOBLOG RECORDS
60	(3C)	CHARACTER	16	CPL14ADID	APPLICATION ID
76	(4C)	CHARACTER	10	CPL14IA	INPUT ARRIVAL YYMMDDHHMM
76	(4C)	CHARACTER	6	CPL14IAD	IA DATE



## CPLREC14 - Current plan job log staging and status record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
82	(52)	CHARACTER	4	CPL14IAT	IA TIME
86	(56)	CHARACTER	1	CPL14OCLASS	ORIG MSG CLASS
87	(57)	CHARACTER	1	CPL14SYST	A=JES2, B=JES3 4=AS400 U=UNIX X=AIX O=OS/2
88	(58)	CHARACTER	1	CPL14FLAGS	FLAGS
				CPL14NCMP	1= JOBLOG NOT COMPLETE
				CPL14HEAD	1= FIXED PART OF RECORD HAS BEEN PASSED TO CONTR.
				CPL14COMP	1= JOBLOG IS IN COMPRESSED FORMAT (CSRCE SRV COMPR.)
				CPL14NOLOG	1= NO JOBLOG FOUND
				CPL14R3	1= R3 OR LATER
				CPL14DELREQ	1= DELAYED RETRIEVAL REQ
				CPL14ARC	ARCH JOB LOG RETRIEVAL
				CPL14NOSTR	1=DO NOT ASK JLOGSTRU 0=ASK JLOGSTRU
89	(59)	UNSIGNED	1	CPL14FSTEP	ENDED-IN-ERROR STEP NO
90	(5A)	CHARACTER	1	CPL14VERS	CB VERSION
91	(5B)	CHARACTER	5	CPL14STATUS	STATUS OF JOBLOG
91	(5B)	CHARACTER	1	CPL14ST	ARCHIVING STATUS A = ARCHIVED IN CONTROLLER R = WAITING FOR RETRIEVAL
92	(5C)	CHARACTER	4	CPL14MVSID	SMF TRACKER MVS™ ID
96	(60)	SIGNED	4	CPL14SLO	OFFSET TO STEP LIST IN REC
100	(64)	CHARACTER	3	CPL14JR	LAST 3 NUMBERS OF JES REL
103	(67)	CHARACTER	4	CPL14JRD	JES READER DATE IN BINARY (COPY OF 3P EXRDATE)
107	(6B)	CHARACTER	4	CPL14JRT	JES READER TIME IN BINARY (COPY OF 3P EXRDATE)
111	(6F)	CHARACTER		CPLDATA14	DATA PORTION

### Message line entry segment

The value of CPL#LINE in the common data segment describes the number of message line entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLSYSOUT14	
0	(0)	SIGNED	4	CPLMSG14L	LENGTH OF SYSOUT MESSAGE LINE
4	(4)	CHARACTER	2	CPLMSGFLG	FLAGS
4	(4)	CHARACTER	1	CPLLLTYPE14	LINTYPE J = JOBLOG <BLANK> = USERSYSOUT
5	(5)	CHARACTER	1	*	RESERVED
6	(6)	SIGNED	2	CPLMSG14NO	OFFSET TO NEXT MESSAGE
8	(8)	CHARACTER	*	CPLMSG14	MESSAGE

## CPLREC14 - Current plan job log staging and status record

### Cross reference

Name	Hex Offset	Hex Value	Level
CPL#LINE	38		3
CPLDATA14	6F		2
CPLLO14	34		3
CPLLTYP14	4		3
CPLMSGFLG	4		2
CPLMSG14	8		2
CPLMSG14L	0		2
CPLMSG14NO	6		2
CPLOCC14	2		3
CPLOPR14	5		3
CPLREC14	0		1
CPLSEQ14	6		3
CPLSIZ14	30		3
CPLSYSOUT14	0		1
CPLTOTSZ	2C		3
CPLTYP14	0		3
CPL14ADID	3C		3
CPL14ARC	58	02	4
CPL14BDY	8		2
CPL14COMP	58	20	4
CPL14CSZ	30		4
CPL14DELRQ	58	04	4
CPL14EYE	14		3
CPL14FLAGS	58		3
CPL14FSTEP	59		2
CPL14HEAD	58	40	4
CPL14IA	4C		3
CPL14IAD	4C		4
CPL14IAT	52		4
CPL14JID	24		3
CPL14JNM	1C		3
CPL14JR	64		2
CPL14JRD	67		2
CPL14JRT	6B		2
CPL14KEY	0		2
CPL14MVSID	5C		3
CPL14NCMP	58	80	4
CPL14NOLOG	58	10	4
CPL14NOSTR	58	01	4
CPL14OCLASS	56		3
CPL14R3	58	08	4
CPL14SLO	60		2
CPL14ST	5B		3
CPL14STATUS	5B		2
CPL14SYST	57		3
CPL14VERS	5A		2
CPL14WSN	18		3

## CPLREC15 - Stand-alone clean up record

Name : DCLCPR15

Function:

This segment declares the stand-alone clean up record.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	70	CPLREC15	STAND-ALONE CLEAN UP
0	(0)	CHARACTER	18	CPL15KEY	KEY OF RECORD
0	(0)	CHARACTER	2	CPL15TYP	RECORD TYPE (15)
2	(2)	CHARACTER	8	CPL15JNM	JOB NAME
10	(A)	CHARACTER	8	CPL15JID	JOB ID
20	(14)	CHARACTER	50	CPL15BDY	BODY OF RECORD
20	(14)	CHARACTER	6	*	RESERVED
26	(1A)	CHARACTER	4	CPL15EYE	EYE CATCHER=CP15
30	(1E)	CHARACTER	1	CPL15VER	VERSION
31	(1F)	CHARACTER	1	CPL15STAT	CPL15 STATUS
32	(20)	SIGNED	2	CPL15RETRY	ASK OPINFO RETRY COUNTER
34	(22)	CHARACTER	4	CPL15JRD	JES READER DATE IN BINARY
38	(26)	CHARACTER	4	CPL15JRT	JES READER TIME IN BINARY
42	(2A)	CHARACTER	8	CPL15TOK	OCC TOKEN
50	(32)	UNSIGNED	1	CPL15OPR	OPERATION NUMBER
51	(33)	CHARACTER	3	*	RESERVED
54	(36)	CHARACTER	8	CPL15DEST	CLEAN UP JOBLOG DESTINATION SET BY K3P
62	(3E)	CHARACTER	4	CPL15CODE	CLEAN UP JOB ERROR CODE
66	(42)	CHARACTER	24	*	FREE

### Cross reference

Name	Hex Offset	Hex Value	Level
CPLREC15	0		1
CPL15BDY	14		2
CPL15CODE	3E		3
CPL15DEST	36		3
CPL15EYE	1A		3
CPL15JID	A		3
CPL15JNM	2		3
CPL15JRD	22		3
CPL15JRT	26		3
CPL15KEY	0		2
CPL15OPR	32		3
CPL15RETRY	20		3
CPL15STAT	1F		3
CPL15TOK	2A		3
CPL15TYP	0		3
CPL15VER	1E		3

## CPLREC16 - Restart and clean up operinfo for deletion

Name : DCLCPR16

**Function:**

This segment declares the restart and clean up operation information to be deleted (created by DP batch processing).

The CPLREC16 record is structured as follows:

- 1 CPLREC16
- 2 common data
- 2 occurrence entries ( )

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC16	
0	(0)	CHARACTER	19	CPL16KEY	KEY OF RECORD
0	(0)	CHARACTER	2	CPL16TYP	RECORD TYPE (16)
2	(2)	SIGNED	2	CPL16SEQ	SEQUENCE NUMBER
4	(4)	CHARACTER	15	*	RESERVED
19	(13)	CHARACTER	*	CPL15BDY	BODY OF RECORD
19	(13)	CHARACTER	4	CPL16EYE	EYE CATCHER=CP16
23	(17)	CHARACTER	1	CPL16VER	VERSION
24	(18)	CHARACTER	1	*	FREE
26	(1A)	SIGNED	2	CPL16TOT	NUMBER OF ENTRIES IN THIS RECORD
28	(1C)	CHARACTER	8	CPL16TOD	CP16 ID (TOD)
36	(24)	CHARACTER	8	*	FREE
44	(2C)	CHARACTER	*	CPL16VAR	

### Occurrence entry segment

The value of CPL16TOT in the common data segment describes the number of occurrence entries segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPL16TAB	
0	(0)	CHARACTER	8	CPL16ENT(*)	
0	(0)	CHARACTER	8	CPL16OCC	OCCURRENCE TOKEN

### Cross reference

Name	Hex Offset	Hex Value	Level
CPLREC16	0		1
CPL16BDY	13		2
CPL16ENT	0		2
CPL16EYE	13		3
CPL16KEY	0		2
CPL16OCC	0		3
CPL16SEQ	2		3
CPL16TAB	0		1
CPL16TOD	1C		3

## CPLREC16 - Restart and clean up operinfo for deletion

Name	Hex Offset	Hex Value	Level
CPL16TOT	1A		3
CPL16TYP	0		3
CPL16VAR	2C		3
CPL16VER	17		3

## CPLREC20 - Workstation activity record for virtual workstation

Name : DCLCPR20

Function:

For each actual destination associated to a virtual workstation, defines the same kind of information as DCLCPR10.

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	798	CPLREC20	WS ACTIVITY RECORD
0	(0) CHARACTER	19	CPLKEY20	
0	(0) CHARACTER	2	CPLK20	'20'
2	(2) CHARACTER	4	CPLWSN20	WS NAME
6	(6) CHARACTER	1	CPLWSTYP	WS TYPE: '0' ==> NORMAL (FUTURE USE) '1' ==> VIRTUAL '2' ==> VIRTUAL DEST
7	(7) CHARACTER	8	CPLDEST20	WS DESTINATION
15	(F) CHARACTER	4	CPLDATE20	DATE
15	(F) CHARACTER	2	CPLY20	YEAR: 'YY'
17	(11) UNSIGNED	2	CPLJUL20	JULIAN DAY: NNN
19	(13) CHARACTER	779	CPLBDY20	RECORD BODY
19	(13) CHARACTER	4	CPLYE20	EYE CATCHER
23	(17) UNSIGNED	1	CPLVERS20	VERSION NUMBER
24	(18) CHARACTER	6	CPLDAY20	DATE: YYMMDD
30	(1E) CHARACTER	8	CPL#OP20(96)	NUMBER OF PARALLEL OPERATIONS PER 15 MINUTES

### Cross reference

HEX NAME	HEX	OFFSET	VALUE	LEVEL
CPL#OP20		1E		3
CPLBDY20		13		2
CPLDATE20		F		3
CPLDAY20		18		3
CPLDEST20		7		3
CPLYE20		13		3
CPLJUL20		11		4
CPLKEY20		0		2
CPLK20		0		3
CPLREC20		0		1
CPLVERS20		17		3
CPLWSN20		2		3
CPLWSTYP		6		3
CPLY20		F		4

## CPLREC22 - Current plan virtual workstation record

### CPLREC22 - Current plan virtual workstation record

Name : DCLCPR22

Function:

This segment declares a current plan workstation record, physically located in EQQCPxDS and EQQNCPDS.

The CPLREC22 record is structured as follows:

- 1 CPLREC22
  - 2 common data
  - 2 open time interval ( )
  - 2 access method ( )

For each actual destination associated to a virtual workstation, defines the same kind of information as DCLCPR02.

### Common data segment

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	*	CPLREC22	CURRENT PLAN WS RECORD
0	(0) CHARACTER	236	CPLCOM22	
0	(0) CHARACTER	19	CPLKEY22	
0	(0) CHARACTER	2	CPLKID22	TYPE IS ALWAYS 22
2	(2) CHARACTER	4	CPLWSN22	WORKSTATION NAME
6	(6) CHARACTER	8	CPLDST22	DESTINATION NAME
14	(E) CHARACTER	5	CPLKF22	SHOULD CONTAIN BLANKS
19	(13) CHARACTER	217	CPLBDY22	WS RECORD BODY
19	(13) CHARACTER	4	CPLEYE22	EYECATCHER
23	(17) UNSIGNED	1	CPLVERS22	VERSION NUMBER
24	(18) CHARACTER	32	CPLDESCR22	WS DESCRIPTION
56	(38) CHARACTER	12	CPLSUMC	SUM OF COMPLETED OPERATIONS
56	(38) SIGNED	4	CPLSUMC#	NOT USED
60	(3C) SIGNED	4	CPLSUMCE	NOT USED
64	(40) SIGNED	4	CPLSUMCR	NOT USED
68	(44) CHARACTER	12	CPLSUMI	SUM OF INTERRUPTED OPERATIONS
68	(44) SIGNED	4	CPLSUMI#	NOT USED
72	(48) SIGNED	4	CPLSUMIE	NOT USED
76	(4C) SIGNED	4	CPLSUMIR	NOT USED
80	(50) CHARACTER	8	CPLSUMS	SUM OF STARTED OPERATIONS
80	(50) SIGNED	4	CPLSUMS#	NUMBER
84	(54) SIGNED	4	CPLSUMSE	ESTIMATED DURATION
88	(58) CHARACTER	8	CPLSUMR	SUM OF 'READY' OPERATIONS (R,A,*)
88	(58) SIGNED	4	CPLSUMR#	NOT USED
92	(5C) SIGNED	4	CPLSUMRE	NOT USED
96	(60) CHARACTER	8	CPLSUMW	SUM OF WAITING OPERATIONS
96	(60) SIGNED	4	CPLSUMW#	NOT USED
100	(64) SIGNED	4	CPLSUMWE	NOT USED
104	(68) SIGNED	4	CPLSUMA	NOT USED
108	(6C) SIGNED	4	CPLSUMNRR	NOT USED
112	(70) SIGNED	4	CPLSUMU	NOT USED
116	(74) SIGNED	4	CPLSUME	NOT USED
120	(78) SIGNED	4	CPLSUML	NOT USED
124	(7C) CHARACTER	8	CPLCREVT	
124	(7C) SIGNED	4	CPLDATE	DATE FORMAT (00YYDDDF)
128	(80) SIGNED	4	CPLTIME	TIME FORMAT (SECS*100)
132	(84) SIGNED	4	CPLSUMX	SUM OF DUMMY COMPL OPERATIONS
136	(88) SIGNED	4	*(2)	
144	(90) CHARACTER	1	CPLWSTYP	COPIED FROM OWNING CP02
145	(91) CHARACTER	1	CPLWSREP	COPIED FROM OWNING CP02
146	(92) CHARACTER	2	CPLWSR1N	RESOURCE NAME
148	(94) UNSIGNED	2	CPLWSR1IU#	NUMBER IN USE (PARALLEL SERVERS IN USE = NO. STARTED OPERATIONS
150	(96) CHARACTER	2	CPLWSR1FLG	RESOURCE INDICATORS
	1... ....		CPLWSR1C	RESOURCE USED AT CONTROL
	.1.. ....		*	FREE

## CPLREC22 - Current plan virtual workstation record

		...1. ....	CPLWSWAIT	COPIED FROM OWNING CP02
		...1 ....	CPLWSVIRT	COPIED FROM OWNING CP02
		.... 1...	CPLWSZCAGENT	COPIED FROM OWNING CP02
150	(96)	BITSTRING	1 *	FREE
		.... .1..	CPLWSZNOINFO	ZCENTRIC NO INFO AVAIL
		.... ..1.	CPLWSDYN	DYNAMIC WORKSTATION
150	(96)	BITSTRING	1 *	FREE
152	(98)	CHARACTER	2 CPLWSR2N	RESOURCE NAME
154	(9A)	UNSIGNED	2 CPLWSR2IU#	NUMBER IN USE
156	(9C)	CHARACTER	2 CPLWSR2FLG	RESOURCE INDICATORS
		1... ....	CPLWSR2C	RESOURCE USED AT CONTROL
		.1.. ....	CPLWSSTAT	WSSTAT GENERATED STATUS
		..1. ....	CPLUX009	UX009 GENERATED STATUS
156	(9C)	BITSTRING	1 *	RESERVED
158	(9E)	CHARACTER	1 CPLRLTYP	READY LIST TYPE
159	(9F)	CHARACTER	1 CPLFLG02	FLAG BITS
		1... ....	CPLPREP	COPIED FROM OWNING CP02
		.1.. ....	CPLIVLNU	IVL NOT USED AT ALL
		..1. ....	CPLIVLNP	NO PARALLEL SERVERS
		...1 ....	CPLSTC	COPIED FROM OWNING CP02
		.... 1...	CPLWTO	COPIED FROM OWNING CP02
		.... .1..	CPLOFF_PEND	WS IS PENDING OFFLINE
		.... ..1.	CPLRTR_PEND	T EVENT PENDING
		.... ...1	CPLAWS_VARY	VARIED AWS SET
160	(A0)	CHARACTER	8 CPLPREEV	
160	(A0)	CHARACTER	4 CPLPREDT	DATE IN TIME MACRO FORM
164	(A4)	CHARACTER	4 CPLPRETM	TIME IN TIME MACRO FORM
168	(A8)	CHARACTER	8 CPLSUDS	NOT USED
176	(B0)	SIGNED	2 CPLIVL22#I	NUMBER OF OPEN INTERVLS
178	(B2)	SIGNED	2 CPLMAX15	NOT USED
180	(B4)	CHARACTER	1 CPLWSSTA	USED BY DIALOG
181	(B5)	CHARACTER	1 CPLCWS_STAT	WORK STATION STATUS
182	(B6)	SIGNED	2 CPLTRT02	NOT USED
184	(B8)	CHARACTER	8 CPLCOFF02	OFFLINE TIME STAMP
184	(B8)	CHARACTER	4 CPLCOFF_DATE	OFFLINE DATE
188	(BC)	CHARACTER	4 CPLCOFF_TIME	OFFLINE TIME
192	(C0)	CHARACTER	4 CPLCAWS02	NOT USED
196	(C4)	UNSIGNED	2 CPLSEQ#02	CURRENT SUBMIT SEQUENCE
198	(C6)	UNSIGNED	1 CPLRSEQ#02	CURRENT REQUEST SEQUENC
199	(C7)	UNSIGNED	1 CPLSUMCES	NOT USED
200	(C8)	UNSIGNED	1 CPLSUMCRS	NOT USED
201	(C9)	UNSIGNED	1 CPLSUMIES	NOT USED
202	(CA)	UNSIGNED	1 CPLSUMIRS	NOT USED
203	(CB)	UNSIGNED	1 CPLSUMSES	
204	(CC)	UNSIGNED	1 CPLSUMRES	NOT USED
205	(CD)	UNSIGNED	1 CPLSUMWES	NOT USED
206	(CE)	CHARACTER	1 CPLWSTWS	NOT USED
207	(CF)	CHARACTER	1 CPLLNK02	NOT USED
208	(D0)	CHARACTER	1 CPLFLGTWS	NOT USED
		1... ....	CPLLNKVA	NOT USED
		.1.. ....	CPLSTAVA	NOT USED
		..1. ....	CPLLNKDW	NOT USED
		...1 ....	CPLWRTST	NOT USED
		.... 1...	CPLCMDLNK	NOT USED
		.... .1..	CPLCMDSTA	NOT USED
		.... ..1.	CPLFULLNK	NOT USED
209	(D1)	CHARACTER	1 CPLAUTO	ALWAYS N
210	(D2)	SIGNED	2 CPLACCM22#	ALWAYS 0 NOT USED
212	(D4)	SIGNED	2 CPLLIMIT	CPU LIMIT VALUE
214	(D6)	CHARACTER	1 *	FREE
215	(D7)	CHARACTER	1 CPLRENGT	REMOTE ENGINE TYPE
216	(D8)	SIGNED	4 CPLVMAX15	MAC NO EVENTS IN 15 MIN
220	(DC)	SIGNED	2 CPLEOPT22#	NOT USED
222	(DE)	CHARACTER	14 *	FREE
236	(EC)	CHARACTER	* CPLWSVAR22	VARIABLE LENGTH SECTION

## CPLREC22 - Current plan virtual workstation record

### Open time interval segment

The value of CPLIVL22#1 in the common data segment describes the number of open time interval segments that follow the common data.

Offsets	Type	Length	Name	Description	
236	(EC)	STRUCTURE	48	CPLIVLOI22(*)	
236	(EC)	CHARACTER	10	CPLIVLFR	INTERVAL START
236	(EC)	CHARACTER	6	CPLIVLFD	DATE YYMMDD
242	(F2)	CHARACTER	4	CPLIVLFT	TIME HHMM
246	(F6)	CHARACTER	10	CPLIVLTO	INTERVAL END
246	(F6)	CHARACTER	6	CPLIVLTD	DATE YYMMDD
252	(FC)	CHARACTER	4	CPLIVLTT	TIME HHMM
256	(100)	UNSIGNED	2	CPLIVL#PS	MAX PARALLEL SERVERS
258	(102)	UNSIGNED	2	CPLIVL#DPPS	SAME, SET AT DAILY PLANNING
260	(104)	BITSTRING	1	CPLIVLF2	FLAGS
		1... ....		CPLIVLMC	IVL SET BY MCP
		.1.. ....		CPLIVLDP	IVL SET BY DP (WSD)
		..11 1111		*	FREE
261	(105)	CHARACTER	1	*	FREE
262	(106)	UNSIGNED	2	CPLIVL#R1	CURRENT RESOURCE CAPACITY
264	(108)	UNSIGNED	2	CPLIVL#DPR1	CAPACITY SET AT DAILY PLAN
266	(10A)	UNSIGNED	2	CPLIVL#R2	CURRENT RESOURCE CAPACITY
268	(10C)	UNSIGNED	2	CPLIVL#DPR2	CAPACITY SET AT DAILY PLAN
270	(10E)	CHARACTER	4	CPLIVLAWS	NOT USED
274	(112)	CHARACTER	4	CPLIVLDPAWS	NOT USED
278	(116)	CHARACTER	6	*	FREE

### Cross reference

NAME	HEX OFFSET	HEX VALUE	LEVEL
CPLACCM22#	D2		4
CPLAUTO	D1		4
CPLAWS_VARY	9F	01	5
CPLBDY22	13		3
CPLCAWS02	C0		4
CPLCMDLNK	D0	08	5
CPLCMDSTA	D0	04	5
CPLCOFF_DATE	B8		5
CPLCOFF_TIME	BC		5
CPLCOFF02	B8		4
CPLCOM22	0		2
CPLCREVT	7C		4
CPLCWS_STAT	B5		4
CPLDATE	7C		5
CPLDESCR22	18		4
CPLDST22	6		4
CPLEOPT22#	DC		4
CPLYE22	13		4
CPLFLGTWS	D0		4
CPLFLG02	9F		4
CPLFULLNK	D0	02	5
CPLIVL#DPPS	102		2
CPLIVL#DPR1	108		2
CPLIVL#DPR2	10C		2
CPLIVL#PS	100		2
CPLIVL#R1	106		2
CPLIVL#R2	10A		2
CPLIVLAWS	10E		2
CPLIVLDP	104	40	3
CPLIVLDPAWS	112		2
CPLIVLFD	EC		3
CPLIVLFR	EC		2
CPLIVLFT	F2		3



## CPLREC22 - Current plan virtual workstation record

CPLIVLF2	104		2
CPLIVLMC	104	80	3
CPLIVLNP	9F	20	5
CPLIVLNU	9F	40	5
CPLIVLOI22	EC		1
CPLIVLTD	F6		3
CPLIVLTO	F6		2
CPLIVLTT	FC		3
CPLIVL22#I	B0		4
CPLKEY22	0		3
CPLKF22	E		4
CPLKID22	0		4
CPLLIMIT	D4		4
CPLLNKDW	D0	20	5
CPLLNKVA	D0	80	5
CPLLNK02	CF		4
CPLMAX15	B2		4
CPLOFF_PEND	9F	04	5
CPLPREDT	A0		5
CPLPREEV	A0		4
CPLPREP	9F	80	5
CPLPRETM	A4		5
CPLREC22	0		1
CPLRENGT	D7		4
CPLRLTYP	9E		4
CPLRSEQ#02	C6		4
CPLRTR_PEND	9F	02	5
CPLSSEQ#02	C4		4
CPLSTAVA	D0	40	5
CPLSTC	9F	10	5
CPLSUDS	A8		4
CPLSUMA	68		4
CPLSUMC	38		4
CPLSUMC#	38		5
CPLSUMCE	3C		5
CPLSUMCES	C7		4
CPLSUMCR	40		5
CPLSUMCRS	C8		4
CPLSUME	74		4
CPLSUMI	44		4
CPLSUMI#	44		5
CPLSUMIE	48		5
CPLSUMIES	C9		4
CPLSUMIR	4C		5
CPLSUMIRS	CA		4
CPLSUML	78		4
CPLSUMNRR	6C		4
CPLSUMR	58		4
CPLSUMR#	58		5
CPLSUMRE	5C		5
CPLSUMRES	CC		4
CPLSUMS	50		4
CPLSUMS#	50		5
CPLSUMSE	54		5
CPLSUMSES	CB		4
CPLSUMU	70		4
CPLSUMW	60		4
CPLSUMW#	60		5
CPLSUMWE	64		5
CPLSUMWES	CD		4
CPLSUMX	84		4
CPLTIME	80		5
CPLTRT02	B6		4
CPLUX009	9C	20	5
CPLVERS22	17		4
CPLVMAX15	D8		4
CPLWRTST	D0	10	5

## CPLREC22 - Current plan virtual workstation record

CPLWSDYN	96	02	5
CPLWSN22	2		4
CPLWSREP	91		4
CPLWSR1C	96	80	5
CPLWSR1FLG	96		4
CPLWSR1IU#	94		4
CPLWSR1N	92		4
CPLWSR2C	9C	80	5
CPLWSR2FLG	9C		4
CPLWSR2IU#	9A		4
CPLWSR2N	98		4
CPLWSSTA	B4		4
CPLWSSTAT	9C	40	5
CPLWSTWS	CE		4
CPLWSTYP	90		4
CPLWSVAR22	EC		2
CPLWSVIRT	96	10	5
CPLSWAIT	96	20	5
CPLWSZCAGENT	96	08	5
CPLWSZNOINFO	96	04	5
CPLWTO	9F	08	5

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## CPLREC24 - Current plan job recovery record

Name : DCLCPR24

Function:

This segment declares a jobname table record, physically located in EQQCPxDS and EQQNCPDS.

The CPLREC24 record is structured as follows:

- 1 CPLREC24
  - 2 common data
  - 2 message line entries ( )

### Common data segment

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	208	CPLREC24	JOB RECOVERY RECORD	
0	(0)	CHARACTER	8	CPL24KEY	KEY OF RECORD	
0	(0)	CHARACTER	2	CPLTYP24	TYPE IS ALWAYS 24	
2	(2)	UNSIGNED	3	CPLOCC24	OCCURENCE NUMBER	
5	(5)	UNSIGNED	1	CPLOPR24	OPERATION NUMBER	
6	(6)	SIGNED	2	CPLSEQ24	SEQUENCE NUMBER, 1ST=0001 IS NOT USED	
8	(8)	CHARACTER	81	CPL24BDY	BODY MUST BE 85	
8	(8)	CHARACTER	4	CPL24EYE	EYE CATCHER	
12	(C)	CHARACTER	16	CPL24ADID	OCCURRENCE ADID	
28	(1C)	CHARACTER	10	CPL24IA	OCCURRENCE INPUT ARRIVAL YYMMDDHHMM	
28	(1C)	CHARACTER	6	CPL24IAD	IA DATE	
34	(22)	CHARACTER	4	CPL24IAT	IA TIME	
38	(26)	CHARACTER	8	CPL24JREID	JOB ID OF RECOVERY JOB	
38	(26)	CHARACTER	4	CPL24JREIDP	JOBID PREFIX	
42	(2A)	SIGNED	4	CPL24JREIDN	JOB ID NUMBER USED IN DATA PROCESSING IS NOT DISPLAYED	
46	(2E)	CHARACTER	4	CPL24WSN	WORKSTATION NAME	
50	(32)	SIGNED	1	CPL24RJST	RECOVERY JOB STATUS	
51	(33)	CHARACTER	1	CPL24FLAGS	FLAGS	

## CPLREC24 - Current plan job recovery record

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				CPL24COMP	1= JOBLOG IS IN COMPRESSED FORMAT (CSRCE SRV COMPR.)
				CPL24NOLOG	1= NO JOBLOG FOUND
				CPL24FAIL	JOB FAIL
				*	RESERVED
52	(34)	SIGNED	4	CPL24TOTSZ	TOTAL SIZE OF RECORD, BEFORE THE SPLIT INTO TWO OR MORE RECORDS AND BEFORE COMPRESSION
56	(38)	SIGNED	4	CPLSIZ24	SIZE OF RECORD WHEN IN CP
56	(38)	SIGNED	4	CPL24CSZ	COMPRESSED SIZE (INCL HEADER)
60	(3C)	CHARACTER	10	CPL24START	RECOVERY JOB START
60	(3C)	CHARACTER	6	CPL24STARTD	DATE   BLANK
66	(42)	SIGNED	4	CPL24STARTT	TIME IN SEC*100   0
70	(46)	CHARACTER	10	CPL24END	RECOVERY JOB END TIME
70	(46)	CHARACTER	6	CPL24ENDD	DATE   BLANK
76	(4C)	SIGNED	4	CPL24ENDT	TIME IN SEC*100   0 TIME IN SEC*100   0
80	(50)	SIGNED	4	CPL#LINE24	NUMBER OF JOBLOG RECORDS
84	(54)	SIGNED	4	CPLLO24	OFFSET TO LAST MESSAGE LINE
88	(58)	CHARACTER	1	*	RESERVED
89	(59)	CHARACTER	1	CPL24ST	STATUS OF JOBLOG ARCHIVING: ' ' =NOT REQUIRED W=WAITING FOR RETRIEVAL C=RETRIEVE COMPLETED E=RETRIEVE ENDED IN ERROR
90	(5A)	CHARACTER	1	CPL24VERS	VERSION
91	(5B)	CHARACTER	1	*	RESERVED
92	(5C)	CHARACTER	8	CPL24JID	ID OF JOB TO RECOVER
100	(64)	CHARACTER	8	CPL24RJID	RECOVERY JOB ID TO DISPLAY
108	(6C)	SIGNED	4	CPL24DUR	RECOVERY JOB DURATION (SEC*100)
112	(70)	SIGNED	4	CPL24PROMPTID	RECOVERY PROMPT ID
116	(74)	CHARACTER	64	CPL24PRTMSG	RECOVERY MESSAGE
180	(B4)	CHARACTER	1	CPL24PRTSTAT	RECOVERY PROMPT STATUS: ' ' = NO PROMPT 'A' = ASKED (NO REPLY) 'N' = REPLY WITH N 'Y' = REPLY WITH Y
181	(B5)	CHARACTER	1	CPL24RECTYPE	RECOVERY TYPE USED FOR DISPLAY FOR CODE USE EX0: S = STOP C = CONTINUE R = RERUN
182	(B6)	CHARACTER	4	CPL24ERRC	ERROR CODE
186	(34)	CHARACTER	4	CPL24MAINWS	RECOVER JOB WORKSTATION
190	(BE)	CHARACTER	2	*	RESERVED
192	(C0)	CHARACTER	4	CPL24ERRCFIX	ERROR CODE FIXED

## CPLREC24 - Current plan job recovery record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
196	(C4)	SIGNED	12	*	RESERVED
208	(D0)	CHARACTER		CPLDATA24	DATA PORTION

## Messages line segment

The value of CPL#LINE24 in the common data segment describes the number of message line segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLSYSOUT24	
0	(0)		4	CPLMSG24L	LENGTH OF SYSOUT MESSAGE LINE
4	(4)	CHARACTER	2	CPLMSG24FLG	FLAGS
4	(4)	CHARACTER	1	CPLLLTYPE24	LINE TYPE: J = JOBLOG ' ' =USERSYSOUT
5	(5)		1	*	RESERVED
6	(6)		2	CPLMSG24NO	OFFSET TO NEXT MESSAGE
8	(8)		*	CPLMSG24	MESSAGE

## Cross reference

Name	Hex Offset	Hex Value	Level
CPL#LINE24	50		3
CPLDATA24	D0		2
CPLLO24	54		3
CPLLLTYPE24	4		3
CPLMSG24	8		2
CPLMSG24FLG	4		2
CPLMSG24L	0		2
CPLMSG24NO	6		2
CPLOCC24	2		3
CPLOPR24	5		3
CPLREC24	0		1
CPLSEQ24	6		3
CPLSIZ24	38		3
CPLSYSOUT24	0		1
CPLTYP24	0		3
CPL24ADID	C		3
CPL24BDY	8		2
CPL24COMP	33	80	4
CPL24CSZ	38		4
CPL24DUR	6C		2
CPL24END	46		3
CPL24ENDD	46		4
CPL24ENDT	4C		4
CPL24ERRC	B6		2
CPL24ERRCFIX	C0		2
CPL24EYE	8		3

## CPLREC24 - Current plan job recovery record

Name	Hex Offset	Hex Value	Level
CPL24FAIL		20	4
CPL24FLAGS	33		3
CPL24IA	1C		3
CPL24IAD	1C		4
CPL24IAT	22		4
CPL24JID	5C		2
CPL24JREID	26		3
CPL24JREIDN	2A		4
CPL24JREIDP	26		2
CPL24KEY	0		2
CPL24MAINWS	BA		2
CPL24NOLOG	33	40	4
CPL24PROMPTID	70		2
CPL24PRTMSG	74		2
CPL24PRTSTAT	B4		2
CPL24RECTYPE	B5		2
CPL24RJID	64		2
CPL24RJST	32		3
CPL24ST	59		2
CPL24START	3C		3
CPL24STARTD	3C		4
CPL24STARTT	42		4
CPL24TOTSZ	34		3
CPL24VERS	5A		2
CPL24WSN	2E		3

---

## CPLREC3C - Current plan occurrence record

Name : DCLCPR3C

Function:

This segment declares a current plan occurrence record, physically located in EQQCPXDS and EQQNCPDS.

The structure of the occurrence record is as follows:

```
DCL
  1 CPLREC3C
    2 common data
    2 ETT variables ( )
```

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC3C	OCCURRENCE RECORD
0	(0)	CHARACTER	302	CPLCOM3C	COMMON PART OR RECORD
0	(0)	CHARACTER	12	CPLKEYOC	
0	(0)	CHARACTER	2	*	TYPE IS ALWAYS 03
2	(2)	CHARACTER	4	CPLNDXOC	KEY TO OCCURRENCE RECORD
2	(2)	UNSIGNED	3	CPLOC03C	OCCURRENCE NUMBER
5	(5)	UNSIGNED	1	CPLOP03C	OP. NUMBER SET TO ZERO
6	(6)	CHARACTER	6	CPLKF03C	SHOULD CONTAIN BLANKS
12	(C)	CHARACTER	290	CPLBDYOC	BODY OF OCCURRENCE RECORD
12	(C)	CHARACTER	4	CPLYE3C	EYECATCHER
16	(10)	UNSIGNED	1	CPLVERS3C	VERSION NUMBER

## CPLREC3C - Current plan occurrence record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
17	(11)	CHARACTER	8	CPLGROUP3C	AUTHORITY GROUP
25	(19)	CHARACTER	3	*	FREE
28	(1C)	CHARACTER	16	CPLADIOC	APPLICATION ID
44	(2C)	CHARACTER	10	CPLIAOC	INPUT ARRIVAL FROM LTP
44	(2C)	CHARACTER	6	CPLIADOC	DATE
50	(32)	CHARACTER	4	CPLIATOC	TIME
54	(36)	CHARACTER	10	CPLIMOC	MODIFIED INPUT ARRIVAL OR IA FROM LTP
54	(36)	CHARACTER	6	CPLIMDOC	DATE
60	(3C)	CHARACTER	4	CPLIMTOC	TIME
64	(40)	SIGNED	2	CPLNETOC	NETWORK ID
66	(42)	CHARACTER	24	CPLXTOC	APPL.DESCRPTIVE TEXT
90	(5A)	CHARACTER	16	CPLOIDOC	OWNER ID
106	(6A)	CHARACTER	24	CPLTXOC	OWNER DESCRIPTION
130	(82)	CHARACTER	10	CPLDLOC	DEADLINE
130	(82)	CHARACTER	6	CPLDLDOC	DATE
136	(88)	CHARACTER	4	CPLDLTOC	TIME
140	(8C)	CHARACTER	1	CPLPRIOC	PRIORITY
141	(8D)	CHARACTER	1	CPLSTAO	S=STARTED U=UNDECIDED D=DELETED W=WAITING C=COMPLETE E=ENDED IN ERROR P=PENDING PREDECESSOR
142	(8E)	CHARACTER	10	CPLAAOC	ACTUAL ARRIVAL   BLANK
142	(8E)	CHARACTER	6	CPLAADOC	DATE
148	(94)	CHARACTER	4	CPLAATOC	TIME
152	(98)	CHARACTER	10	CPLACOC	ACTUAL COMPLETION   BLANK
152	(98)	CHARACTER	6	CPLACDOC	DATE
158	(9E)	CHARACTER	4	CPLACTOC	TIME
162	(A2)	SIGNED	2	CPLCOPOC	NDX TO NON-COMPLETE OP WITH EARLIEST LATEST OUT
164	(A4)	UNSIGNED	4	CPLRDUOC	REMAINING DURATION ON CURRENT CRITICAL PATH
168	(A8)	SIGNED	4	CPLROPOC	NUMBER OF REMAINING OPERATIONS ON CURRENT CRITICAL PATH
172	(AC)	SIGNED	4	CPL#OPOC	NUMBER OF OPERATIONS IN OCCURRENCE
176	(B0)	SIGNED	4	CPLOPCOC	NUMBER OF OPS COMPLETED
180	(B4)	SIGNED	4	CPL#EROC	NUMBER OF OPS ENDED IN ERROR
184	(B8)	SIGNED	4	CPL#UNOC	NUMBER OF OPS UNDECIDED
188	(BC)	SIGNED	4	CPL#STOC	NUMBER OF OPS STARTED OR INTERRUPTED
192	(C0)	CHARACTER	4	CPLERROC	ERROR CODE OF OCC
196	(C4)	SIGNED	2	CPLRSROC	INDEX OF REM.SLACK CHAIN
198	(C6)	SIGNED	2	CPLRSOOC	OFFSET IN REM SLACK REC
200	(C8)	SIGNED	2	CPLUOROC	INDEX OF UNDECIDED CHAIN R
202	(CA)	SIGNED	2	CPLUOOOC	OFFSET IN UNDECIDED REC
204	(CC)	CHARACTER	1	CPLSWIOC	BIT SWITCHES
				CPLREROC	1 = RERUN REQUESTED
				CPLDEFOC	1 = DEFAULT RULE FOR PEND
				CPLXPOC	1 = CURR. VALUE IN AAOC FROM OP. WITH EXPL. INPUT ARRIVAL

## CPLREC3C - Current plan occurrence record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				CPLMCPOC	1 = ADDED BY MCP
				CPLLTPOC	CAME FROM LTP AT LAST DP
				CPLMONC	ANY MONITORED OPERATIONS IN OCCURRENCE
				*	FREE
205	(CD)	CHARACTER	1	CPLADDOC	HOW ADDED TO CP D MEANS MCP-DIALOG E MEANS ETT P MEANS PIF A MEANS AR BLANK MEANS DP
206	(CE)	CHARACTER	16	CPLJV TAB	JCL VAR TABLE NAME
222	(DE)	CHARACTER	16	CPLOCCGROUP	OCCURRENCE GROUP REF
238	(EE)	CHARACTER	16	CPLCAL	CALENDAR NAME
254	(FE)	CHARACTER	8	CPLUSEROC	LAST UPDATE USERID
262	(106)	CHARACTER	8	CPLOCCTOK	OCCURRENCE TOKEN: TOD
270	(10E)	CHARACTER	1	CPLTWSOCC	Y = TWS OCCURRENCE
271	(10F)	UNSIGNED	1	CPLETTINFO	EXTENDED ETT INFO AREA 0 = NOT ALLOCATED 1 = ALLOCATED
272	(110)	SIGNED	2	CPLRUNIDC	ADR RUN CYCLE ID
274	(112)	CHARACTER	2	*	FREE
276	(114)	SIGNED	4	CPL#XCOC	
280	(118)	CHARACTER	22	*	FREE
302	(12E)	CHARACTER	*	CPLVAR3C	VARIABLE PART OF RECORD

## ETT variables segment

You can have the ETT variables segment only if CPLETTINFO in the common data segment is greater than 0.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	159	CPLETTVAR	ETT VARIABLES
0	(0)	CHARACTER	159	CPLETT3C	ETT ENTRY
0	(0)	CHARACTER	44	CPLETTCRIT	ETT CRITERIA
44	(2C)	CHARACTER	1	CPLETTTYP	ETT TYPE: J OR R
45	(2D)	CHARACTER	8	CPLETTJOB	JOB NAME
53	(35)	CHARACTER	8	CPLETTJID	JOB ID
61	(3D)	SIGNED	1	CPLETTGROOTL	GDG ROOT LENGTH
62	(3E)	CHARACTER	44	CPLETTEVNAM	COMPLETE ETT EVENT NAME
106	(6A)	CHARACTER	53	*	FREE

## Cross reference

Name	Hex Offset	Hex Value	Level
CPL#EROOC	B4		4
CPL#OPOC	AC		4
CPL#STOC	BC		4
CPL#UNOC	B8		4
CPLAADOC	8E		5
CPLAAOC	8E		4
CPLAATOC	94		5

## CPLREC3C - Current plan occurrence record

Name	Hex Offset	Hex Value	Level
CPLACDOC	98		5
CPLACOC	98		4
CPLACTOC	9E		5
CPLADDOC	CD		4
CPLADIOC	1C		4
CPLBDYOC	C		3
CPLCAL	EE		4
CPLCOM3C	0		2
CPLCOPOC	A2		4
CPLDEFOC	CC	40	5
CPLDLDOC	82		5
CPLDLOC	82		4
CPLDLTOC	88		5
CPLERROC	C0		4
CPLETTCRIT	0		3
CPLETTEVNAM	3E		3
CPLETTGROOTL	3D		3
CPLETTINFO	10F		4
CPLETTJID	35		3
CPLETTJOB	2D		3
CPLETTYYP	2C		3
CPLETTVAR	0		1
CPLETT3C	0		2
CPLXPOC	CC	20	5
CPLEYE3C	C		4
CPLGROUP3C	11		4
CPLIADOC	2C		5
CPLIAOC	2C		4
CPLIATOC	32		5
CPLIMDOC	36		5
CPLIMOC	36		4
CPLIMTOC	3C		5
CPLJVTAB	CE		4
CPLKEYOC	0		3
CPLKF03C	6		4
CPLLTPOC	CC	08	5
CPLUSEROC	FE		4
CPLMCPOC	CC	10	5
CPLMONC	CC	04	5
CPLNDXOC	2		4
CPLNETOC	40		4
CPLOCCGROUP	DE		4
CPLOCCTOK	106		4
CPLOC03C	2		5
CPLOIDOC	5A		4
CPLOPCOC	B0		4
CPLOP03C	5		5
CPLOTXOC	6A		4
CPLPRIOC	8C		4
CPLRDUOC	A4		4
CPLREC3C	0		1



## CPLREC3C - Current plan occurrence record

Name	Hex Offset	Hex Value	Level
CPLREROC	CC	80	5
CPLROPOC	A8		4
CPLRSOOC	C6		4
CPLRSROC	C4		4
CPLRUNIDC	110		4
CPLSTAOC	8D		4
CPLSWIOC	CC		4
CPLTWSOCC	10E		4
CPLTXTOC	42		4
CPLUOOOC	CA		4
CPLUOROC	C8		4
CPLVAR3C	12E		2
CPLVERS3C	10		4

## CPLREC3P - Current plan operation record

Name : DCLCPR3P

Function:

This segment declares a current plan operation record, physically located in EQQCPXDS and EQQNCPDS.

The structure of the operation record is as follows:

```

DCL
  1 CPLREC3P
    2 common data
    2 predecessor operations ( )
    2 successor operations ( )
    2 conditional predecessor operations ( )
    2 conditional successor operations ( )
    2 special resources ( )
    2 extended name ( )
    2 system automation info ( )
  
```

### Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	CPLREC3P	OPERATION RECORD
0	(0)	CHARACTER	436	CPLCOM3P	
0	(0)	CHARACTER	12	CPLKEYOP	
0	(0)	CHARACTER	2	CPLKYP3P	TYPE IS ALWAYS 03
2	(2)	CHARACTER	4	CPLNDXOP	KEY TO OCC/OP RECORD
2	(2)	UNSIGNED	3	CPLOC03P	OCCURENCE NUMBER
5	(5)	UNSIGNED	1	CPLOP03P	OPERATION NUMBER
6	(6)	CHARACTER	6	CPLKF03P	SHOULD CONTAIN BLANKS
12	(C)	CHARACTER	424	CPLBDYOP	BODY OF OPERATION RECORD
12	(C)	CHARACTER	4	CPLEYE3P	EYECATCHER
16	(10)	UNSIGNED	1	CPLVERS3P	VERSION NUMBER
17	(11)	CHARACTER	8	CPLGROUP3P	AUTHORITY GROUP

## CPLREC3P - Current plan operation record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
25	(19)	CHARACTER	1	CPLCLNSTAT	CLEAN UP STATUS. BLANK=NONE C=COMPLETED E=ENDED IN ERROR I=INITIATED O=AVAIL OPINFO R=REQUEST OPINFO S=STARTED W=WAITING OPINFO
26	(1A)	CHARACTER	16	CPLADIOP	APPLICATION ID
42	(2A)	CHARACTER	10	CPLIAOP	APPL INP. ARRIVAL AFTER MCP
42	(2A)	CHARACTER	6	CPLIADOP	DATE
48	(30)	CHARACTER	4	CPLIATOP	TIME
52	(34)	SIGNED	2	CPLNETOP	NETWORK ID
54	(36)	CHARACTER	24	CPLTXTOP	OP TEXT DESCRIPTION
78	(4E)	CHARACTER	8	CPLJBNOP	OP OS JOBNAME   BLANK
86	(56)	CHARACTER	8	CPLJIDOP	JOB ID
86	(56)	CHARACTER	4	CPLJIDOPP	JOB ID PREFIX FOR TWS
90	(5A)	SIGNED	4	CPLJIDOPN	JOB ID NUMBER (TWS)
94	(5E)	CHARACTER	6	CPLIDOP	OPERATION ID
94	(5E)	CHARACTER	4	CPLWSOP	WS NAME
98	(62)	SIGNED	2	CPLNUMOP	OPERATION CREATION NUMBER
100	(64)	CHARACTER	1	CPLJCLOP	JOBCLASS OR SYSOUTCLASS   BLANK
101	(65)	BITSTRING	1	CPLFLG05	FLAG BYTE 5
				CPLDEFLT	OPER I/A DEFAULTED
				CPLPSUWAIT	1=WAIT FOR PSU DONE
				CPLCP15REQ	ON=ASK OPI CP15 IN PROGRESS
				CPLMHLD	ON=MANUALLY HELD OP
				CPLNOP	ON=NOP OP
				CPLXEC	ON=EXECUTE OPERATION
				CPLCLNCM	ON=CLEAN UP COMMAND ISSUED
				CPLSSEQ#	CPLISOP USED AS SSEQ#
102	(66)	CHARACTER	8	CPLFRMOP	FORMNUMBER   BLANK
110	(6E)	CHARACTER	10	CPLPSOP	PLANNED START
110	(6E)	CHARACTER	6	CPLPSDOP	DATE   BLANK
116	(74)	SIGNED	4	CPLPSTOP	TIME   BLANK
120	(78)	CHARACTER	10	CPLPEOP	PLANNED END
120	(78)	CHARACTER	6	CPLPEDOP	DATE   BLANK
126	(7E)	SIGNED	4	CPLPETOP	TIME   BLANK
130	(82)	CHARACTER	10	CPLOIOP	OPERATION INPUT ARRIVAL
130	(82)	CHARACTER	6	CPLOIDOP	DATE   BLANK
136	(88)	CHARACTER	4	CPLOITOP	TIME   BLANK
140	(8C)	CHARACTER	10	CPLODOP	OPERATION DEADLINE
140	(8C)	CHARACTER	6	CPLODDOP	DATE   BLANK
146	(92)	CHARACTER	4	CPLODTOP	TIME   BLANK
150	(96)	CHARACTER	10	CPLLOOP	LATEST OUT FOR OP
150	(96)	CHARACTER	6	CPLLODOP	DATE
156	(9C)	SIGNED	4	CPLLOTOP	TIME
160	(A0)	CHARACTER	10	CPLASOP	ACTUAL START
160	(A0)	CHARACTER	6	CPLASDOP	DATE   BLANK
166	(A6)	SIGNED	4	CPLASTOP	TIME   BLANK
170	(AA)	CHARACTER	10	CPLAAOP	ACTUAL ARRIVAL
170	(AA)	CHARACTER	6	CPLAADOP	DATE   BLANK
176	(B0)	SIGNED	4	CPLAATOP	TIME   0

## CPLREC3P - Current plan operation record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
180	(B4)	CHARACTER	10	CPLISOP	INTERMEDIATE START (IF OP
180	(B4)	CHARACTER	6	CPLISDOP	DATE   BLANK WAS IRUPT)
180	(B4)	UNSIGNED	2	CPLSSEQ#OP	SUBMIT SEQUENCE #
180	(B4)	CHARACTER	2	CPLISDOPF2	SUBMIT SEQUENCE #
182	(B6)	CHARACTER	4	CPLISDOPL4	(WHEN JOB, STC OR WTO)
186	(BA)	SIGNED	4	CPLISTOP	TIME   0
190	(BE)	CHARACTER	10	CPLAEOP	ACTUAL END
190	(BE)	CHARACTER	6	CPLAEDOP	DATE   BLANK
196	(C4)	SIGNED	4	CPLAETOP	DATE   BLANK
200	(C8)	SIGNED	4	CPLEDUOP	ESTIMATED DURATION
204	(CC)	UNSIGNED	4	CPLADUOP	ACTUAL DURATION
208	(D0)	SIGNED	2	CPLOPIRET	ASK OPINFO RETRY COUNTER
210	(D2)	SIGNED	2	CPL#PSOP	PARALLEL SERVERS REQUIRED
212	(D4)	SIGNED	2	CPL#R1OP	WS RESOURCES REQUIRED
214	(D6)	SIGNED	2	CPL#R2OP	WS RESOURCES REQUIRED
216	(D8)	CHARACTER	1	CPLCSTOP	CURRENT STATE
					W = WAITING
					A = WAITING FOR ARRIVAL
					R = READY
					* = READY PREV WS NONREP
					S = STARTED
					I = INTERRUPTED
					U = UNDECIDED
					C = COMPLETED
					E = ENDED IN ERROR
217	(D9)	CHARACTER	4	CPLERROP	ERROR CODE
221	(DD)	CHARACTER	1	CPLAECOP	AUTOM. ERROR COMPL.(YES NO)
222	(DE)	CHARACTER	1	CPLPRIOP	PRIORITY
223	(DF)	CHARACTER	1	CPLXSTOP	EXTENDED STATUS
224	(E0)	SIGNED	2	CPLERKOP	INDEX TO ERROR RECORD   0
226	(E2)	SIGNED	2	CPLEROOP	OFFSET IN ERROR RECORD   0
228	(E4)	SIGNED	2	CPL#SUOP	NUMBER OF SUCCESSORS
230	(E6)	SIGNED	2	CPL#PROP	NUMBER OF PREDECESSORS
232	(E8)	SIGNED	2	CPL#DEOP	NUMBER OF SUCCESSORS AND PREDECESSORS
234	(EA)	SIGNED	2	CPL#PCOP	NUMBER OF PREDECESSORS COMPLETED
236	(EC)	SIGNED	2	CPL#SROP	NO. OF SPECIAL RESOURCES
238	(EE)	BITSTRING	1	CPLFLGOP	FLAGS
				CPLREROP	RERUN RECORD FOR THIS OP
				CPLXTOP	ON=VALIDATION EXIT PASSED
				CPLASSOP	ON=OP. ASSUMED COMPLETED
				CPLSPIA	ON=SPECIFIED IA FOR OP
				CPLSPDL	ON=SPECIFIED DL FOR OP
				CPLASUOP	ON=AUTO SUBMISSION OF JOB
				CPLAJR	ON=AUTO HOLD/RELEASE
				CPLLATEP	ON=LATE OP MSG ISSUED
239	(EF)	BITSTRING	1	CPLFLGO2	FLAGS
				CPLSUBOP	ON=JOB SUBMITTED
				CPLTJTOP	ON=TIME JOB
				CPLPRPOP	ON=PREP WS EXISTS FOR THIS CPU, BUT OP IS NOT COMPLETE
				CPLRELOP	ON=RELEASE AS SOON AS POSS.
				CPL2EVOP	ON=TYPE 2 EVENT READ

## CPLREC3P - Current plan operation record

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
				CPLHRUOP	ON=HIGH RETCODE USED	
				CPLPENDP	A PENDING PREDECESSOR	
				CPLLONGP	ON=LONG DUR MS ISSUED	
240	(F0)	CHARACTER	8	CPLMCPUP	TIME OF LAST MCP UPDATE	
248	(F8)	CHARACTER	1	CPLDEPTOP	DEPENDENCY TYPE (P S)	
249	(F9)	BITSTRING	1	CPLFLGO3	3RD FLAG BYTE	
				CPLRESTA	RESTARTABLE OPERATION	
				CPLDIRES	INST PARM RESTART	
				CPLRERUT	REROUTEABLE OPERATION	
				CPLDIRER	INST PARM REROUTE	
				CPLWRER	OP WAS REROUTED	
				CPLDWTO	DEADLINE WTO WANTED	
				CPLDWTOS	DEADLINE WTO REQ SENT	
				CPLDWTOP	DEADLINE WTO REQ PROC	
250	(FA)	UNSIGNED	2	CPLHRCOP	HIGHEST RETCODE NOT IN ERR	
252	(FC)	SIGNED	2	CPLTMPPOP	TEMPORARY SAVE AREA	
254	(FE)	CHARACTER	4	CPLALTWS	ALTERNATE WS NAME	
258	(102)	SIGNED	2	CPLMXLVL	MAX NESTING LEVEL	
260	(104)	CHARACTER	16	CPLUDATA	USER DATA	
276	(114)	BITSTRING	1	CPLFLAG05	MORE FLAGS	
				CPLMORERUN	0=FIRST RUN 1=AT LEAST ONE RUN	
				CPLJLINFO	0=JLINFO TO BE REQUESTED 1=JLINFO REQUESTED	
				CPLOPINFO	0=LAST OPERINFO NOT AVAILABLE 1=LAST OPERINFO AVAILABLE	
				CPLPSUDONE	0=PSU NOT COMPLETED 1=PSU COMPLETED	
				CPLUSERSYS	1=NEED USER SYSOUT	
				CPLIMMERR	1=IMM FROM ERROR STATE	
				CPLSYSSFAIL	JES SUB FAILED	
				CPLXPJCL	NEED EXPANDED JCL	
277	(115)	CHARACTER	1	CPLJRSTAT	JOBLOG RETRIEVAL STATUS. ' ' = NO ACTION YET 'I' = INITIATED 'R' = REINITIATED 'S' = STARTED (J0-EVT) 'C' = COMPLETE(J2-EVT) 'E' = ERROR (J2-EVT)	
278	(116)	CHARACTER	2	CPLWLM	WLM FIELDS	
278	(116)	CHARACTER	1	CPLJOB CRT	CRITICAL JOB	
279	(117)	CHARACTER	1	CPLJOB POL	LATE JOB POLICY	
280	(118)	CHARACTER	8	CPLTOKEN_FULL	OPERATION FULL TOKEN	
280	(118)	CHARACTER	4	CPLTOKEN_PRE	PREFIX	
284	(11C)	UNSIGNED	4	CPLTOKEN	OPCTOKEN	
288	(120)	CHARACTER	8	CPLXDEST	EXECUTION DEST	
296	(128)	SIGNED	2	CPLASIDJOB	ASID	
298	(12A)	CHARACTER	1	CPLCLNTYP	CLEAN UP TYPE. A=AUTOMATIC I=IMMEDIATE M=MANUAL N=NONE	

## CPLREC3P - Current plan operation record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
299	(12B)	CHARACTER	1	CPLTWSJOB	Y=FTW JOB S=z/OS JOB PREDECESSOR OF A FTW JOB N=OTHER z/OS JOBS Y AND S JOBS ARE ADDED TO THE SYMPHONY
300	(12C)	CHARACTER	8	CPLSTCH	STATUS WAS CHANGED
300	(12C)	CHARACTER	4	CPLSTCHD	YYDDDF
304	(130)	CHARACTER	4	CPLSTCHT	HHMMSSTH
308	(134)	CHARACTER	8	CPLUSEROP	LAST UPDATE USERID
316	(13C)	CHARACTER	8	CPLJLODEST	JOB LOG DESTINATION
324	(144)	CHARACTER	4	CPLPSUTOKEN	PSU REQUEST TOKEN
328	(148)	UNSIGNED	1	CPLOPEX03P	OPERATION NUMBER EXTENSION
329	(149)	CHARACTER	1	CPLCLNRES	CLEAN UP RESULT
330	(14A)	CHARACTER	1	CPLCLNDIA	CLEAN UP FROM DIALOG
331	(14B)	CHARACTER	8	CPLEQQCLJID	LAST EQQCLEAN JOBID
331	(14B)	CHARACTER	8	CPLSUBTOKEN	HTTP JOB SUBMISSION TOKEN
339	(153)	CHARACTER	1	CPLFLAG06	MORE FLAGS
				CPLMONP	OPEN MONITORING FLAG
				CPLEXPJCLUSED	ON=LAST RUN USED EXPANDED JCL
				CPLSENDING	ON=S-SENDING EXSTAT
				CPLSUBER	ON=E-OSUF EXSTAT
				CPLERFAIL	ON=E-FAIL EXSTAT
				CPLRECPRMP	ON=E-PRMPT EXSTAT
				CPLRECJOB	ON=E REC JOB RUNNING
				CPLRECRUN	ON=E/(R,S,C) NOT RESTART
340	(154)	CHARACTER	8	CPLEQQCLJBN	LAST EQQCLEAN JOBNAME
340	(154)	CHARACTER	8	CPLDOATIME	TIME THE OPERATION WAS STARTED
348	(15C)	CHARACTER	1	CPLFLAG07	
				CPLREC24IS	ON=CP24 EXISTS
				CPLRECEAD	ON=OPERATION COMPLETED BY CONTINUE RECOVERY ACTION
				CPLSCRIPT	ON=CENTRALIZED SCRIPT USED
				CPLFROMPLC	ON=COMING FROM PLC PROCESS
				CPLWASUJ	ON=SUBMITTED BY EQQWASUJ
				CPLWAITSE	ON=WAITING FOR SCHEDULING ENVIRONMENT
				CPLWAITWQA	ON=STARTED ON WAIT WORKSTATION
				CPLURGMSG	ON=URGENT MESSAGE ISSUED
349	(15D)	UNSIGNED	1	CPLXEXTINF	EXTENDED JOBNAME AREA: 0 = NOT ALLOCATED 1 = ALLOCATED
350	(15E)	CHARACTER	1	CPLTWSJBNM	CRITERION USED TO BUILD THE TWS JOBNAME IN SYM
351	(15F)	CHARACTER	1	CPLAUTINF	SYSTEM AUTOMATION INFO AREA: Y = ALLOCATED N = NOT ALLOCATED
352	(160)	SIGNED	4	CPLFTWRC	RETURN CODE OF OPERATION RUNNING ON FTW
356	(164)	CHARACTER	8	CPLRUSER	RACF USER FROM EXIT EQQUX001
364	(16C)	SIGNED	2	CPL3PSPLEX	SYSPLEX ID
366	(16E)	CHARACTER	1	CPLFLAG08	MORE FLAGS
				CPLWLMPROM	WLM PROMOTION FLAG
				CPLWLMMMSG	WLM FAILURE MESSAGE FLAG

## CPLREC3P - Current plan operation record

Offsets		Type	Len	Name (Dim)	Description	
Dec	Hex					
				CPLFTSANOP	JOB NOPPED ON STANDARD AGENT HOSTED BY MASTER	
				CPLCRITJOBPREDE	CRITICAL PREDECESSOR	
				CPLDPREM	ON = RECOVERED BY CONDITION	
				CPLTZONE	ON = TIME ZONE APPLIED	
				CPLCONDRJOB	ON = CONDITIONAL RECOVERY JOB	
				CPLNOEVAL	ON = DO NOT EVALUATE SUCCESSOR CONDITION	
367	(16F)	BITSTRING	1	CPLFLAG09	MORE FLAGS	
		1... ..		CPLSTEPDEP	ON = THERE ARE STEP LEVEL CONDITION DEPENDENCIES DEFINED FOR THIS OPERATION	
		.1.. ..		CPLSTEPSUCC	ON = THERE IS AT LEAST 1 STEP LEVEL CONDITIONAL SUCCESSOR DEFINED FOR THIS OPERATION	
		..1. ....		CPLZCENTRIC	ON = JOB ON Z-CENTRIC DISTRIBUTED WORKSTATION	
		...1 ....		CPLRECOVON	ON = RECOV SET (NOT SAVED)	
		.... 1..		CPLNOERR	ON = NOERROR OCCURRED	
		.... .1..		CPLUNEXPRC	ON = UNEXPECTED RC OCCURRED	
		.... ..1.		CPLFAKESUB		
		.... ...1		CPLSHADOW	ON = SHADOW JOB	
368	(170)	CHARACTER	8	CPLWLMCLASS	WLM SERVICE CLASS	
376	(178)	SIGNED	4	CPLCRITPATH	CRITICAL PATH INDICATOR FOR INTERNAL PROCESSING	
380	(17C)	SIGNED	4	CPLEARE	EARLIEST END FOR INTERNAL PROCESSING	
384	(180)	CHARACTER	4	CPLCRTPTHX	CRITICAL PATH ORIGIN KEY	
384	(180)	UNSIGNED	4	CPLPTHOC	OCCURRENCE NUMBER	
387	(183)	UNSIGNED	1	CPLPTHOP	OPERATION NUMBER	
388	(184)	CHARACTER	2	CPLJESDEST	JES DESTINATION	
390	(186)	CHARACTER	8	CPLVDEST	LAST USED VIRTUAL DESTINATION	
398	(18E)	SIGNED	2	CPLTZOFF	TIME ZONE OFFSET IN MINUTES	
400	(190)	UNSIGNED	4	CPLJOBTLIDX	JOB TABLE INDEX	
404	(194)	SIGNED	2	CPL#CPROP	NUMBER OF CONDITIONAL PREDECESSORS	
406	(196)	SIGNED	2	CPL#CSUOP	NUMBER OF CONDITIONAL SUCCESSORS	
408	(198)	SIGNED	2	CPL#CONDTOT	NUMBER OF CONDITIONS: T + F + U + D	
410	(19A)	SIGNED	2	CPL#COND_T	NUMBER OF TRUE CONDITIONS	
412	(19C)	SIGNED	2	CPL#COND_F	NUMBER OF FALSE CONDITIONS	
414	(19E)	SIGNED	2	CPL#COND_U	NUMBER OF UNDEFINED CONDITIONS	
416	(1A0)	SIGNED	2	CPL#CDEOP	NUMBER OF CONDITION DEPENDENCIES	
418	(1A2)	SIGNED	2	CPL#PXOP	NUMBER OF SUPPRESSED BY CONDITION PREDECESSORS	
420	(1A4)	CHARACTER	4	CPLORIGRC	ORIGINAL RETURN CODE	
424	(1A8)	SIGNED	2	CPLCONDID	USED BY GS TO RETURN EXTRA INFORMATION	
	426	(1AA)	UNSIGNED	1	CPLRENGINF	REMOTE ENGINE JOB AREA
	427	(1AB)		1	CPLREJST	
	428	(1AC)		2	CPL#BND	
	430	(1AE)		1	CPLFLAG10	

## CPLREC3P - Current plan operation record

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
		1... ..		CPLDYN	ON = THIS 3P HAS CONDS	
		.1... ..		CPLDRECOV	ON = RECOVERY IN PROGRESS	
		..1. ....		CPLSHOSEQ	ON = SHADOW IN OSEQ	
		...1 1111		*	FREE	
	431	(1AF) CHARACTER	5	*	RESERVED	
	436	(1B4) CHARACTER	*	CPLVAR03	VAR DATA	

### Predecessor operation segment

The value of CPL#PROP in the common data segment describes the number of predecessor operation segments.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	8	CPLPREOP (*)		
0	(0)	CHARACTER	1	CPLPSWOP	PREDECESSOR SWITCHES	
				CPLPCOOP	PREDECESSOR COMPLETED	
				CPLPNROP	PRED. WS WAS NON-REPORTING	
				CPLPNDOP	PENDING PRED. OCCURRENCE	
				CPLCRITPRED	CRITICAL PATH INDICATOR FOR INTERVAL PROCESSING	
				*	RESERVED	
1	(1)	CHARACTER	1	*	RESERVED	
2	(2)	SIGNED	2	CPLPTTOP	TRANSPORT TIME	
4	(4)	CHARACTER	4	CPLPOP	PREDECESSOR OP'S KEY IN CP	
4	(4)	UNSIGNED	3	CPLPOCOP	OCCURRENCE INDEX	
7	(7)	UNSIGNED	1	CPLPOPOP	OPERATION NO.	

### Successor operation segment

The value of CPL#SUOP in the common data segment describes the number of successor operation segments.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	6	CPLSUCOP (*)		
0	(0)	CHARACTER	1	CPLSSWOP	SUCCESSOR SWITCHES	
				CPLSCROP	CRITICAL PATH SUCCESSOR	
				*	RESERVED	
1	(1)	CHARACTER	1	*	RESERVED	
2	(2)	CHARACTER	4	CPLSOP	SUCCESSOR OP'S KEY IN CP	
2	(2)	UNSIGNED	3	CPLSOCOP	OCCURRENCE INDEX	
5	(5)	UNSIGNED	1	CPLSOPOP	OPERATION NUMBER	

## CPLREC3P - Current plan operation record

### Special resource segment

The value of CPL#SR0P in the common data segment describes the number of special resource segments.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	64	CPLSR0P (*)	
0	(0)	CHARACTER	44	CPLSRNOP	NAME OF SPECIAL RESOURCE
44	(2C)	CHARACTER	1	CPLSRTOP	S = SHARED, X = EXCLUSIVE
45	(2D)	BITSTRING	1	*	FLAGS
				CPLSRVOP	AVAILABLE
				CPLSRIOUSOP	IN USE SHARED
				CPLSRIOUSOP	IN USE EXCLUSIVELY
				CPLSRKEPT	WAS KEPT AT ERROR
				CPLSRKEPTX	IN EXCLUSIVE USE
				CPLRESCNEW	Q515W MSG ISSUED
				*	RESERVED
46	(2E)	CHARACTER	1	CPLSRERR	ON ERROR FLAG
47	(2F)	UNSIGNED	1	CPLSRWRS	REASON FOR WAIT
48	(30)	SIGNED	4	CPLSRNUM	AMOUNT
52	(34)	SIGNED	4	CPLSRIDX	RESOURCE INDEX ID
56	(38)	CHARACTER	8	CPLALCTIME	ALLOCATION TIME
64	(40)	CHARACTER	1	CPLSRVACO	SET SPECIAL RESOURCE AVAILABILITY TO NO
65	(41)	CHARACTER	3	*	FREE

### Extended job name segment

You can have the extended job name sub-segment in the operation segment only if CPLEXTINF in the common data segment is greater than 0.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	200	CPL3PEXTINFO	
0	(0)	CHARACTER	54	CPL3PEXTNAME	EXTENDED JOB NAME
54	(36)	CHARACTER	16	CPL3PSENAME	SCHEDULING ENVIRONMENT NAME
70	(46)	CHARACTER	130	*	FREE

### Conditional predecessor segment

The value of CPL#CPROP in the common data segment describes the number of conditional predecessor segments.

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	8	CPLCPREOP(*)	
0	(0)	BITSTRING	1	CPLCPSWOP	FLAGS
	1... ....		CPLCPNDOP	PENDING CONDITIONAL PREDECESSOR OCCURENCE	
	.1.. ....		CPLCPCOOP	ON = IF EXTERNAL, CPRE NOT TO BE CREATED	
	..11 1111		*	FREE	
1	(1)	CHARACTER	1	*	FREE
2	(2)	SIGNED	2	CPLCPOP_CID	CONDITION ID
4	(4)	CHARACTER	4	CPLCPOP_	OPERATION VSAM KEY:
4	(4)	UNSIGNED	3	CPLCPOCOP	- OCCURRENCE NUMBER
7	(7)	UNSIGNED	1	CPLCPOPOP	- OPERATION NUMBER



## Conditional successor segment

The value of CPL#CSUOP in the common data segment describes the number of conditional successor segments.

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	8	CPLCSUCOP(*)	
0	(0)	BITSTRING	1	CPLCSSWOP	FLAGS
1	(1)	BITSTRING	1	CPLCSUFLAG	
		1... ..		CPLCSUSTEP	ON = COND SUCC WITH STEP DEPENDENCY POINTING TO THIS RECORD
		.111 1111	*		FREE
2	(2)	SIGNED	2	CPLCSOP_CID	CONDITION ID
4	(4)	CHARACTER	4	CPLCSOP	OPERATION VSAM KEY:
4	(4)	UNSIGNED	3	CPLCSOCOP	- OCCURRENCE NUMBER
7	(7)	UNSIGNED	1	CPLCSOPOP	- OPERATION NUMBER

## Extended Information

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	200	CPLRENG	
0	(0)	CHARACTER	16	CPLRENG_JSNAME	AD ID
16	(10)	CHARACTER	40	CPLRENG_JOBNAME	JOB NAME TWSZ
16	(10)	CHARACTER	8	CPLRENG_ZJOB	MATCHED JOB NAME TWSZ
56	(38)	CHARACTER	16	CPLRENG_JSWS	JOBSTREAM WS TWSZ
56	(38)	CHARACTER	4	CPLRENG_ZWS	MATCHED WORKSTATION TWSZ
72	(48)	CHARACTER	3	CPLRENG_OPNO	OPERATION NUMBER TWSZ
75	(4B)	BITSTRING	1	CPLRENG_FLAGS	
		1... ..		CPLRENG_COMP	COMPLETE IF BIND FAILS
		.111 1111	*		FREE
76	(4C)	CHARACTER	10	CPLRENG_IA	MATCHED INPUT ARRIVAL
76	(4C)	CHARACTER	6	CPLRENG_IAD	DATE
82	(52)	CHARACTER	4	CPLRENG_IAT	TIME
82	(52)	CHARACTER	2	CPLRENG_IATH	HH
84	(54)	CHARACTER	2	CPLRENG_IATM	MM
86	(56)	CHARACTER	114	*	FREE

## Cross reference

NAME	HEX OFFSET	HEX VALUE	LEVEL
CPL#BND	1AC		4
CPL#CDEOP	1A0		4
CPL#COND_F	19C		4
CPL#COND_T	19A		4
CPL#COND_U	19E		4
CPL#CONDTOT	198		4
CPL#CPROP	194		4
CPL#CSUOP	196		4
CPL#DEOP	E8		4
CPL#PCOP	EA		4
CPL#PROP	E6		4
CPL#PSOP	D2		4
CPL#PXOP	1A2		4
CPL#R1OP	D4		4
CPL#R2OP	D6		4
CPL#SROP	EC		4
CPL#SUOP	E4		4
CPLAADOP	AA		5
CPLAOP	AA		4
CPLAATOP	B0		5

## CPLREC3P - Current plan operation record

	CPLADIOP	1A		4
	CPLADUOP	CC		4
	CPLAECOP	DD		4
	CPLAEDOP	BE		5
	CPLAEOP	BE		4
	CPLAETOP	C4		5
	CPLAJR	EE	02	5
	CPLALCTIME	38		2
	CPLALTWS	FE		4
	CPLASDOP	A0		5
	CPLASIDJOB	128		4
	CPLASOP	A0		4
	CPLASSOP	EE	20	5
	CPLASTOP	A6		5
	CPLASUOP	EE	04	5
	CPLAUTINF	15F		4
	CPLBDYOP	C		3
	CPLBNDDEL	8	80	3
	CPLBNDFLAG	8		2
	CPLBNDOP	0		1
	CPLBND99K	0		2
	CPLCLNCM	65	02	5
	CPLCLNDIA	14A		4
	CPLCLNRES	149		4
	CPLCLNSTAT	19		4
	CPLCLNTYP	12A		4
	CPLCOM3P	0		2
	CPLCONDID	1A8		4
	CPLCONDRJOB	16E	02	5
	CPLCPCOOP	0	40	3
	CPLCPNDOP	0	80	3
	CPLCPOCOP	4		3
	CPLCPOP	4		2
	CPLCPOP_CID	2		2
	CPLCPOP0P	7		3
	CPLCPREOP	0		1
	CPLCPSWOP	0		2
	CPLCP15REQ	65	20	5
	CPLCRITJOBPREP	16E	10	5
	CPLCRITPATH	178		4
	CPLCRITPREP	0	10	3
	CPLCRTPTHX	180		4
	CPLCSOCOP	4		3
	CPLCSOP	4		2
	CPLCSOP_CID	2		2
	CPLCSOP0P	7		3
	CPLCSSWOP	0		2
	CPLCSTOP	D8		4
	CPLCSUCOP	0		1
	CPLCSUFLAG	1		2
	CPLCSUSTEP	1	80	3
	CPLDEFLT	65	80	5
	CPLDEPTOP	F8		4
	CPLDIRER	F9	10	5
	CPLDIRES	F9	40	5
	CPLDOATIME	154		5
	CPLDPREM	16E	08	5
	CPLDRECOV	1AE	40	5
	CPLDWTO	F9	04	5
	CPLDWTOP	F9	01	5
	CPLDWTOS	F9	02	5
	CPLDYN	1AE	80	5
	CPLARE	17C		4
	CPLEDUOP	C8		4
	CPLEQQCLJBN	154		4
	CPLEQQCLJID	14B		4
	CPLERFAIL	153	08	5

## CPLREC3P - Current plan operation record

	CPLERKOP	E0		4
	CPLEROOP	E2		4
	CPLERROP	D9		4
	CPLXDEST	120		4
	CPLXEC	65	04	5
	CPLXPJCL	114	01	5
	CPLXPJCLUSED	153	40	5
	CPLXTINF	15D		4
	CPLXTOP	EE	40	5
	CPLYE3P	C		4
	CPLFAKESUB	16F	02	5
	CPLFLAG05	114		4
	CPLFLAG06	153		4
	CPLFLAG07	15C		4
	CPLFLAG08	16E		4
	CPLFLAG09	16F		4
	CPLFLAG10	1AE		4
	CPLFLG0P	EE		4
	CPLFLG02	EF		4
	CPLFLG03	F9		4
	CPLFLG05	65		4
	CPLFRM0P	66		4
	CPLFROMPLC	15C	10	5
	CPLFTSANOP	16E	20	5
	CPLFTWRC	160		4
	CPLGROUP3P	11		4
	CPLHRCOP	FA		4
	CPLHRU0P	EF	04	5
	CPLIAD0P	2A		5
	CPLIA0P	2A		4
	CPLIAT0P	30		5
	CPLID0P	5E		4
	CPLIMMERR	114	04	5
	CPLISD0P	B4		5
	CPLISD0PF2	B4		7
	CPLISD0PL4	B6		6
	CPLIS0P	B4		4
	CPLIST0P	BA		5
	CPLJBN0P	4E		4
	CPLJCLOP	64		4
	CPLJESDEST	184		4
	CPLJID0P	56		4
	CPLJID0PN	5A		5
	CPLJID0PP	56		5
	CPLJLINFO	114	40	5
	CPLJLODEST	13C		4
	CPLJOB CRT	116		5
	CPLJOB POL	117		5
	CPLJOB TBLIDX	190		4
	CPLJRSTAT	115		4
	CPLKEY0P	0		3
	CPLKF03P	6		4
	CPLKYP3P	0		4
	CPLLATEP	EE	01	5
	CPLLOD0P	96		5
	CPLLONGP	EF	01	5
	CPLLOOP	96		4
	CPLLOT0P	9C		5
	CPLUSER0P	134		4
	CPLMCPUP	F0		4
	CPLMHL D	65	10	5
	CPLMONP	153	80	5
	CPLMORERUN	114	80	5
	CPLMXLVL	102		4
	CPLNDX0P	2		4
	CPLNET0P	34		4
	CPLNOERR	16F	08	5

## CPLREC3P - Current plan operation record

CPLNOEVAL	16E	01	5
CPLNOP	65	08	5
CPLNUMOP	62		5
CPLCOC3P	2		5
CPLODDOP	8C		5
CPLDODOP	8C		4
CPLDODTOP	92		5
CPLDIDOP	82		5
CPLDIOOP	82		4
CPLDITOP	88		5
CPLPEX03P	148		4
CPLPINFO	114	20	5
CPLPIRET	D0		4
CPLP03P	5		5
CPLRIGRC	1A4		4
CPLPCOOP	0	80	3
CPLPEDOP	78		5
CPLPENDP	EF	02	5
CPLPEOP	78		4
CPLPETOP	7E		5
CPLPNDOP	0	20	3
CPLPNROP	0	40	3
CPLPOCOP	4		3
CPLPOP	4		2
CPLPOPOP	7		3
CPLPREOP	0		1
CPLPRIOP	DE		4
CPLPRPOP	EF	20	5
CPLPSDOP	6E		5
CPLPSOP	6E		4
CPLPSTOP	74		5
CPLPSUDONE	114	10	5
CPLPSUTOKEN	144		4
CPLPSUWAIT	65	40	5
CPLPSWOP	0		2
CPLPTHOC	180		5
CPLPTHOP	183		5
CPLPTTOP	2		2
CPLRECEND	15C	40	5
CPLRECJOB	153	02	5
CPLRECPRMP	153	04	5
PLRECRUN	153	01	5
CPLREC24IS	15C	80	5
CPLREC3P	0		1
CPLREJST	1AB		4
CPLRELOP	EF	10	5
CPLRENG	0		1
CPLRENG_COMP	4B	80	3
CPLRENG_FLAGS	4B		2
CPLRENG_IA	4C		2
CPLRENG_IAD	4C		3
CPLRENG_IAT	52		3
CPLRENG_IATH	52		3
CPLRENG_IATM	54		4
CPLRENG_JOBNAME	10		4
CPLRENG_JSNAME	0		2
CPLRENG_JSWS	38		2
CPLRENG_OPNO	48		2
CPLRENG_ZJOB	10		2
CPLRENGZWS	38		3
CPLRENGINF	1AA		4
CPLREROP	EE	80	5
CPLRERUT	F9	20	5
CPLRESCNEW	2D	04	3
CPLRESTA	F9	80	5
CPLRUSER	164		4
CPLSCRIPT	15C	20	5

## CPLREC3P - Current plan operation record

	CPLSCROP	0	80	3
	CPLSENDING	153	20	5
I	CPLSHADOW	16F	01	5
I	CPLSHOSEQ	1AE	20	5
	CPLSOCOP	2		3
	CPLSOP	2		2
	CPLSOPOP	5		3
	CPLSPDL	EE	08	5
	CPLSPIA	EE	10	5
	CPLSRAVACO	40		2
	CPLSRAVOP	2D	80	3
	CPLSRERR	2E		2
	CPLSRIDX	34		2
	CPLSRIUSOP	2D	40	3
	CPLSRIUXOP	2D	20	3
	CPLSRKEPT	2D	10	3
	CPLSRKEPTX	2D	08	3
	CPLSRNOP	0		2
	CPLSRNUM	30		2
	CPLSRSOP	0		1
	CPLSRTOP	2C		2
	CPLSRWRS	2F		2
	CPLSSEQ#	65	01	5
	CPLSSEQ#OP	B4		6
	CPLSSWOP	0		2
	CPLSTCH	12C		4
	CPLSTCHD	12C		5
	CPLSTCHT	130		5
	CPLSTEPDEP	16F	80	5
	CPLSTEPSUCC	16F	40	5
	CPLSUBER	153	10	5
	CPLSUBOP	EF	80	5
	CPLSUBTOKEN	14B		5
	CPLSUCOP	0		1
	CPLSYSSFAIL	114	02	5
	CPLTJTOP	EF	40	5
	CPLTMPPOP	FC		4
	CPLTOKEN	11C		5
	CPLTOKEN_FULL	118		4
	CPLTOKEN_PRE	118		5
	CPLTWSJBNM	15E		4
	CPLTWSJOB	12B		4
	CPLTXTOP	36		4
	CPLTZOFF	18E		4
	CPLTZONE	16E	04	5
	CPLUDATA	104		4
I	CPLUNEXPRC	16F	04	5
	CPLURGMSG	15C	01	5
	CPLUSERSYS	114	08	5
	CPLVAR03	1B2		2
	CPLVDEST	186		4
	CPLVERS3P	10		4
	CPLWAITSE	15C	04	5
	CPLWAITWQA	15C	02	5
	CPLWASUJ	15C	08	5
	CPLWLM	116		4
	CPLWLMCLASS	170		4
	CPLWLMMSG	16E	40	5
	CPLWLMPROM	16E	80	5
	CPLWRER	F9	08	5
	CPLWSOP	5E		5
	CPLXSTOP	DF		4
	CPLZCENTRIC	16F	20	5
	CPL2EVOP	EF	08	5
	CPL3PEXTINFO	0		1

## CPLREC3P - Current plan operation record

CPL3PEXTNAME	0	2
CPL3PSENAME	36	2
CPL3PSPLEX	16C	4

## CPLREC3Q - Current plan operation condition record

Name : DCLCPR3Q

Function:

This segment declares a current plan operation condition record, physically located in EQQCPXDS and EQQNCPS.

The structure of the operation record is as follows:

```
DCL
  1 CPLREC3Q
    2 common data
    2 condition dependency ( )
```

### Common data segment

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	*	CPLREC3Q	OPERATION CONDITION RECORD
0	(0) CHARACTER	133	CPLCOM3Q	
0	(0) CHARACTER	12	CPLKEY3Q	
0	(0) CHARACTER	2	CPLKYP3Q	TYPE IS ALWAUS 03
2	(2) CHARACTER	4	CPLNDX3Q	OPR VSAM KEY
2	(2) UNSIGNED	3	CPLOC03Q	OCCUURENCE NUMBER
5	(5) UNSIGNED	1	CPLOP03Q	OPERATION NUMBER
6	(6) CHARACTER	2	CPLFIL13Q	ALWAYS '--' ( '6060'X )
8	(8) SIGNED	2	CPLCOID3Q	COND ID
10	(A) CHARACTER	2	CPLFIL23Q	SHOULD CONTAIN BLANKS
12	(C) CHARACTER	121	CPLBDY3Q	BODY OF CONDITION RECORD
12	(C) CHARACTER	4	CPLEYE3Q	EYE CATCHER: CP3Q
16	(10) UNSIGNED	1	CPLVERS3Q	VERSION NUMBER
17	(11) CHARACTER	3	CPLFIL33Q	SHOULD CONTAIN '00'X
20	(14) SIGNED	2	CPLTYPE3Q	CONDITION TYPE: 1 = ONE OF 2 = AT LEAST N OF 3 = ALL
22	(16) SIGNED	2	CPL#SIMP3Q	NUMBER OF CONDITION DEPENDENCIES
24	(18) SIGNED	2	CPLCOUNT3Q	COUNTER: - ONLY FOR TYPE 2
26	(1A) BITSTRING	1	CPLFLAGS3Q	CONDITION FLAGS
	1... ....		CPLEMPTY3Q	CONDITION EMPTY
	.1.. ....		CPLAURES3Q	CONDITION GENERATED BY SUCCESSOR RESOLUTION
	..1. ....		CPLSTCHG3Q	CONDITION STATUS CHANGE(NOT SAVED)
	...1 ....		CPLSTEP3Q	CONTAINS STEP LEVEL CONDITION DEPENDENCIES
	.... 1111		*	FREE
27	(1B) CHARACTER	1	*	FREE
28	(1C) CHARACTER	24	CPLDESC3Q	DESCRIPTION
52	(34) CHARACTER	1	CPLVALUE3Q	FINAL CONDITION STATUS: U = UNDECIDED T = TRUE F = FALSE
53	(35) CHARACTER	16	CPLADID3Q	ADID OF THE OWNING OPERATION
69	(45) CHARACTER	10	CPLIA3Q	OCCURRENCE IA OF THE OWNING OPERATION
69	(45) CHARACTER	6	CPLIAD3Q	- DATE
75	(4B) CHARACTER	4	CPLIAT3Q	- TIME
79	(4F) CHARACTER	1	CPLXST3Q	EXTENDED STATUS (RERUN)
80	(50) SIGNED	2	CPLREFID3Q	REF. CONDITION ID (SUCCESSOR RESOLUTION)
82	(52) CHARACTER	51	*	FREE
133	(85) CHARACTER	*	CPLVAR3Q	

## Condition dependency segment

The value of CPL#SIMP3Q in the common data segment describes the number of condition dependencies segments.

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	82	CPLSIMP3Q(*)	
0	(0) CHARACTER	4	CPLSIMP_KEY	VSAM KEY OF CONDITIONAL PRED
0	(0) UNSIGNED	3	CPLSIM3QOC	
3	(3) UNSIGNED	1	CPLSIM3QOP	
4	(4) CHARACTER	2	CPLSIMPTYP	CONDITION DEPENDENCY CHECK TYPE: ST = STATUS RC = RETURN CODE
6	(6) CHARACTER	2	CPLSIMPLG	OPERATOR: GE, GT, LE, LT, EQ, NE, RG
8	(8) CHARACTER	4	CPLSIMPVALRC	RC VALUE
12	(C) CHARACTER	4	CPLSIMPVALRC2	RC2 VALUE
16	(10) CHARACTER	1	CPLSIMPVALST	ST VALUE
17	(11) CHARACTER	1	CPLSIMPLVAL	SIMPLE COND STATUS: U = UNDECIDED T = TRUE F = FALSE
18	(12) CHARACTER	36	CPLSIMP_EXTKEY	BLANK FOR INTERNAL PREDECESSOR
18	(12) CHARACTER	16	CPLSIMPADI	APPLICATION ID
34	(22) CHARACTER	10	CPLSIMPIA	APPLICATION INPUT ARRIVAL
34	(22) CHARACTER	6	CPLSIMPIAD	DATE
40	(28) CHARACTER	4	CPLSIMPIAT	TIME
44	(2C) CHARACTER	10	*	FREE
54	(36) CHARACTER	1	*	FREE
55	(37) CHARACTER	1	CPLSIMPDEP	I (INTERNAL) E (EXTERNAL)
56	(38) BITSTRING	1	CPLSIMPFLAG	FLAGS
	1... ..		CPLSIMPREM	ON: OPER REMOVED BY DP
	.1.. ..		CPLSIMSTCHG	ON: CONDITION DEP STATUS CHANGE
	..1. ....		CPLSIMPMISS	ON: STEP-END INFO MISSING
	...1 ....		CPLSIMPMISSCHG	ON: MISSING EVENT SET
	.... 1...		CPLSIMPMISSNO	ON: STEP NOT MISSING BUT NOT EVALUATED FOR SUCCESSOR VIEW
	.... ..11		CPLSIMMISSNOCHG	ON: MISSNO EV SET
			*	FREE
57	(39) CHARACTER	9	*	FREE
66	(42) CHARACTER	8	CPLSIMPSTEP	PROCEDURE INVOCATION STEP NAME
74	(4A) CHARACTER	8	CPLSIMPSTEP	STEP NAME

## Cross reference

NAME	HEX OFFSET	HEX VALUE	LEVEL
CPL#SIMP3Q	16		4
CPLADID3Q	35		4
CPLAURES3Q	1A	40	5
CPLBDY3Q	C		3
CPLCOID3Q	8		4
CPLCOM3Q	0		2
CPLCOUNT3Q	18		4
CPLDESC3Q	1C		4
CPLEMPTY3Q	1A	80	5
CPLEYE3Q	C		4
CPLFIL13Q	6		4
CPLFIL23Q	A		4
CPLFIL33Q	11		4
CPLFLAGS3Q	1A		4
CPLIAD3Q	45		5
CPLIAT3Q	4B		5
CPLIA3Q	45		4
CPLKEY3Q	0		3
CPLKYP3Q	0		4
CPLNDX3Q	2		4

## CPLREC3Q - Current plan operation condition record

CPL0C03Q	2		5
CPL0P03Q	5		5
CPLREC3Q	0		1
CPLREFID3Q	50		4
CPLSIMP_EXTKEY	12		2
CPLSIMP_KEY	0		2
CPLSIMPADI	12		3
CPLSIMPDEP	37		2
CPLSIMPFLAG	38		2
CPLSIMPIA	22		3
CPLSIMPIAD	22		4
CPLSIMPIAT	28		4
CPLSIMPL0G	6		2
CPLSIMPLVAL	11		2
CPLSIMPMISS	38	20	3
CPLSIMPMISSCHG	38	10	3
CPLSIMPMISSNO	38	08	3
CPLSIMPMISSNOCHG	38	04	3
CPLSIMPSTEP	4A		2
CPLSIMPREM	38	80	3
CPLSIMPSTCHG	38	40	3
CPLSIMPSTEP	42		2
CPLSIMPTYP	4		2
CPLSIMPVALRC	8		2
CPLSIMPVALRC2	C		2
CPLSIMPVALST	10		2
CPLSIMP3Q	0		1
CPLSIMSTCHG	38	40	3
CPLSIM3Q0C	0		3
CPLSIM3Q0P	3		3
CPLSTCHG3Q	1A	20	5
CPLSTEP3Q	1A	10	5
CPLTYPE3Q	14		4
CPLVALUE3Q	34		4
CPLVAR3Q	85		2
CPLVERS3Q	10		4
CPLXST3Q	4F		4

## CPLREC3R - Current plan operation user fields record

Name : DCLCPR3R

Function:

This segment declares a current plan operation user fields record, physically located in EQQCPXDS and EQQNCPDS.

The structure of the operation record is as follows:

DCL

- 1 CPLREC3R
- 2 common data
- 2 user field ( )

### Common data segment

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	*	CPLREC3R OPR CONDITION RECORD
0	(0)	CHARACTER	92	CPLCOM3R
0	(0)	CHARACTER	12	CPLKEY3R
0	(0)	CHARACTER	2	CPLKYP3R TYPE IS ALWAYS 03
2	(2)	CHARACTER	4	CPLNDX3R OPR VSAM KEY
2	(2)	UNSIGNED	3	CPL0C03R OCC NUMBER
5	(5)	UNSIGNED	1	CPL0P03R OPR NUMBER
6	(6)	CHARACTER	2	CPLFIL13R ALWAYS '--' ( '6060'X )
8	(8)	CHARACTER	4	CPLEYE3R ALWAYS 'CP3R'



## CPLREC3R - Current plan operation user fields record

12	(C)	CHARACTER	80	CPLBDY3R	BODY
12	(C)	CHARACTER	4	CPLEYE3R1	ALWAYS 'CP3R'
16	(10)	UNSIGNED	1	CPLVERS3R	VERSION
17	(11)	CHARACTER	4	CPLFIL33R	ALWAYS '00'X
20	(14)	SIGNED	2	CPLUFN3R	NUMBER OF USER FIELDS
22	(16)	CHARACTER	1	CPLVALUE3R	EQUAL TO 'D' MEANS DELETED RECORD
23	(17)	CHARACTER	1	*	FREE
24	(18)	CHARACTER	16	CPLADID3R	ADID OF THE OWNING OPERATION
40	(28)	CHARACTER	10	CPLIA3R	OCC IA OF THE OWNING OPR
40	(28)	CHARACTER	6	CPLIAD3R	DATE
46	(2E)	CHARACTER	4	CPLIAT3R	TIME
50	(32)	CHARACTER	42	*	FREE
92	(5C)	CHARACTER	*	CPLVAR3R	

### User Field segment

The value of CPL#UFN3R in the common data segment describes the number of user fields segments.

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	70	CPLBODY3R(*)	
0	(0)	CHARACTER	16	CPLUFNM3R	USER FIELD NAME
16	(10)	CHARACTER	54	CPLUFV3R	USER FIELD VALUE

### Cross reference

Name	Hex Offset	Hex Value	Level
CPLADID3R	18		4
CPLBDY3R	C		3
CPLBODY3R	0		1
CPLCOM3R	0		2
CPLEYE3R	8		4
CPLEYE3R1	C		4
CPLFIL13R	6		4
CPLFIL33R	11		4
CPLIAD3R	28		5
CPLIAT3R	2E		5
CPLIA3R	28		4
CPLKEY3R	0		3
CPLKYP3R	0		4
CPLNDX3R	2		4
CPLOC03R	2		5
CPLOP03R	5		5
CPLREC3R	0		1
CPLUFNM3R	0		2
CPLUFN3R	14		4
CPLUFV3R	10		2
CPLVALUE3R	16		4
CPLVAR3R	5C		2
CPLVERS3R	10		4

## CPLREC33 - Current plan system automation info occurrence record

### CPLREC33 - Current plan system automation info occurrence record

Name : DCLCPR33

Function:

This segment declares a current plan system automation information occurrence record.

#### Common data segment

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
0	(0)	STRUCTURE	*	CPLREC33	SYSTEM AUTOMATION INFO (SAI) RECORD
0	(0)	CHARACTER	12	CPL33KEY	KEY OF RECORD
0	(0)	CHARACTER	2	CPLTYP33	RECORD TYPE (ALWAYS 33)
2	(2)	UNSIGNED	3	CPLOCC33	OCCURENCE NUMBER IN CP
5	(5)	UNSIGNED	1	CPLOPR33	OPERATION NUMBER
6	(6)	CHARACTER	6	CPLKF033	CONTAINS BLANKS
12	(C)	CHARACTER	404	CPL33BDY	BODY OF SYSTEM AUTOMATION INFO RECORD
12	(C)	CHARACTER	4	CPL33EYE	EYE CATCHER (ALWAYS CP33)
16	(10)	UNSIGNED	1	CPL33VER	RECORD VERSION
17	(11)		1	*	RESERVED
18	(12)	CHARACTER	1	CPLFIL33	ALIGNMENT WITH CP VSAM KEY
19	(13)	CHARACTER	336	CPL33AUTINFO	SYSTEM AUTOMATION INFO SECTION
19	(13)	CHARACTER	256	CPL33COMTXT	SYSTEM AUTOMATION COMMAND TEXT
19	(13)	CHARACTER	64	CPL33COMTXT1	SA COMMAND TEXT, LINE 1
83	(53)	CHARACTER	64	CPL33COMTXT2	SA COMMAND TEXT, LINE 2
147	(93)	CHARACTER	64	CPL33COMTXT3	SA COMMAND TEXT, LINE 3
211	(D3)	CHARACTER	64	CPL33COMTXT4	SA COMMAND TEXT, LINE 4
275	(113)	CHARACTER	8	CPL33AUTOP	SA AUTOMATED FUNCTION (FOR OPERATION)
283	(11B)	CHARACTER	8	CPL33SECELEM	SA SECURITY ELEMENT
291	(123)	CHARACTER	64	CPL33CINFO	SA COMPLETION INFO
355	(163)	CHARACTER	61	*	FREE
416	(1A0)	CHARACTER	31	CPL33VAR	VAR DATA

#### Cross reference

Name	Hex Offset	Hex Value	Level
CPLFIL33	12		3
CPLKF033	6		3
CPLOCC33	2		3
CPLOPR33	5		3

## CPLREC33 - Current plan system automation info occurrence record

Name	Hex Offset	Hex Value	Level
CPLREC33	0		1
CPLTYP33	0		3
CPL33AUTINFO	13		3
CPL33AUTOP	113		4
CPL33BDY	C		2
CPL33CINFO	123		4
CPL33COMTXT	13		4
CPL33COMTXT1	13		5
CPL33COMTXT2	53		5
CPL33COMTXT3	93		5
CPL33COMTXT4	D3		5
CPL33EYE	C		3
CPL33KEY	0		2
CPL33SECELEM	11B		4
CPL33VAR	1A0		2
CPL33VER	10		3

## CPLREC44 - Current plan step name change record

Name : DCLCPR44

Function:

This segment declares the step name change record.

The structure of this record is the following:

DCL 1 CPLREC44

2 common data

2 run info

2 step entries

### Common data segment

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	52	CPLREC44	STEP NAME CHANGE TABLE	
0	(0)	STRUCTURE	52	CPLFIX44		
0	(0)	CHARACTER	16	CPLKEY44		
0	(0)	CHARACTER	2	CPLTYP44	ALWAYS 44	
2	(2)	CHARACTER	4	CPLKOP44	KEY TO RECORD 44	
2	(2)	CHARACTER	3	CPLOCC44	OCCURRENCE NUMBER	
5	(5)	UNSIGNED	3	CPLOPR44	OPERATION NUMBER	
6	(6)	SIGNED	2	CPLSEQ44	ALWAYS 0	
8	(8)	CHARACTER	8	CPLKF44P	RESERVED	
16	(10)	STRUCTURE	36	CPLBDY44	BODY OF RECORD 44	
16	(10)	CHARACTER	4	CPL44EYE	EYE CATCHER	
20	(14)	CHARACTER	1	CPL44VER	VERSION NUMBER	
21	(15)	CHARACTER	1	*	FREE	
22	(16)	CHARACTER	16	CPL44ADID	APPLICATION ID	
38	(26)	CHARACTER	10	CPL44IA	INPUT ARRIVAL TIME	
38	(26)	CHARACTER	6	CPL44IAD	IA DATE	
44	(2C)	CHARACTER	4	CPL14IAT	IA TIME	
48	(30)	SIGNED	4	CPL44RUN	RUN NUMBER	
52	(34)	CHARACTER	*	CPLVAR44	VAR DATA	

## CPLREC44 - Current plan step name change record

### Run information segment

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	4	CPLENT44	RUN INFO	
0	(0)	SIGNED	4	CPLNUM44	STEP NUMBER	
4	(4)	CHARACTER	*	CPLVARE44	VAR DATA	

### Step entry segment

The value of CPLNUM44 in the run information segment describes the number of step entry segments.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	4	CPLSTE44	STEP ENTRY	
0	(0)	SIGNED	1	LAST44	LAST RUN FLAG Y/N	
1	(1)	CHARACTER	3	*	FREE	
4	(4)	CHARACTER	8	STEP44	STEP NAME	
12	(C)	CHARACTER	8	PROCSTEP44	PROCEDURE STEP NAME	
20	(14)	CHARACTER	8	NEWNAME44	NEW STEP NAME	

### Cross reference

Name	Hex Offset	Hex Value	Level
CPL14IAT	2C		5
CPL44ADID	16		4
CPL44EYE	10		4
CPL44IA	26		4
CPL44IAD	26		5
CPL44RUN	30		4
CPL44VER	14		4
CPLBDY44	10		3
CPLENT44	0		1
CPLFIX44	0		2
CPLKEY44	0		3
CPLKF44P	8		4
CPLKOP44	2		4
CPLNUM44	0		2
CPLOCC44	2		5
CPLOPR44	5		5
CPLREC44	0		1
CPLSEQ44	6	80	4
CPLSTE44	0		1
CPLTYP44	0		4
CPLVAR44	34		2
CPLVARE44	4		2
LAST44	0		2
NEWNAME44	14		2
PROCSTEP44	C		2
STEP44	4		2

## CPLREC66 - Critical job index record

Name : DCLCPR66

### Function:

This segment declares a critical job index record, physically located in EQQCPxDS and EQQNCPDS. The structure of this record is the following:

```
DCL 1 CPLREC66
    2 common data
    2 critical job entries ( )
```

### Common data segment

#### Offsets

Dec	Hex	Type	Len	Name	Description
0	(0)	STRUCTURE	40	CPLREC66	CRITICAL JOBS INDEX RECORD
0	(0)	CHARACTER	19	CPLKEY66	
0	(0)	CHARACTER	2 *		TYPE IS ALWAYS 66
2	(2)	CHARACTER	2 *		BLANK
4	(4)	SIGNED	4	CPLSEQ66	SEQUENCE NUMBER
8	(8)	CHARACTER	11	CPLKF66	FILLER, CONTAINS BLANKS
19	(13)	CHARACTER	21	CPLBDY66	BODY OF CRIT JOBS INDEX REC
19	(13)	CHARACTER	4	CPLYE66	EYECATCHER
23	(17)	CHARACTER	1	CPLVERS66	VERSION
24	(18)	CHARACTER	4 *		RESERVED
28	(1C)	SIGNED	4	CPLCRITNUM	NUMBER OF CRIT JOBS IN REC
32	(20)	CHARACTER	8 *		RESERVED
40	(28)	CHARACTER		CPLVAR66	VARIABLE PART OF RECORD

### Critical job entry index segment

#### Offsets

Dec	Hex	Type	Len	Name	Description
0	(0)	STRUCTURE	*	CPLCRIT66	CRIT JOBS SECTION
0	(0)	CHARACTER	28	CPLCRITJOB66(*)	CRIT JOB ENTRY
0	(0)	UNSIGNED	3	CPLOCX66	OCCUR NUMBER
3	(3)	UNSIGNED	1	CPLOPR66	OPERATION NUMBER
4	(4)	SIGNED	4	CPLJTIDX	JOB TABLE INDEX
8	(8)	SIGNED	4	CPLCRPATHREC#	CNT FOR CRIT PATH RECALC
12	(C)	CHARACTER	3	*	FREE
15	(F)	CHARACTER	1	CPLCRPATHTRG	CRIT PATH RECALC TRIGGER
16	(10)	CHARACTER	2	*	CRIT PATH RECALC TRIGGER
18	(12)	CHARACTER	10	CPLCRPATHREC	CRIT PATH RECALC
18	(12)	CHARACTER	6	CPLCRPATHRECD	CRIT PATH RECALC DATE
24	(18)	CHARACTER	4	CPLCRPATHRECT	CRIT PATH RECALC TIME

### Cross reference

NAME	HEX OFFSET	HEX VALUE	LEVEL
CPLBDY66	13		2
CPLCRITJOB66	0		2
CPLCRITNUM	1C		3
CPLCRIT66	0		1
CPLCRPATHREC	12		3
CPLCRPATHREC#	8		3
CPLCRPATHRECD	12		4
CPLCRPATHRECT	18		4
CPLCRPATHTRG	F		3
CPLYE66	13		3
CPLJTIDX	4		3
CPLKEY66	0		2

## CPLREC66 - Critical job index record

CPLKF66	8	3
CPLOCX66	0	3
CPLOPR66	3	3
CPLREC66	0	1
CPLSEQ66	4	3
CPLVAR66	28	3
CPLVERS66	17	3

---

## CPLREC99 - Current plan occurrence index record

Name : DCLCPLRECR99

Function:

Describes layout of current plan occurrence index record.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	43	CPLREC99	STAND-ALONE CLEAN UP
0	(0)	CHARACTER	19	CPL99KEY	KEY OF RECORD
0	(0)	CHARACTER	2	CPL99TYP	RECORD TYPE (99)
2	(2)	CHARACTER	8	CPL99TOK	OCCURRENCE TOKEN=TOD
10	(A)	CHARACTER	9	*	FREE
19	(13)	CHARACTER	24	CPL99BDY	
19	(13)	CHARACTER	4	CPL99EYE	EYE CATCHER=CP99
23	(17)	CHARACTER	1	CPL99VER	VERSION
24	(18)	UNSIGNED	3	CPL99OCC	OCCURRENCE NUMBER IN CP
27	(1B)	CHARACTER	16	*	FREE

## Cross reference

Name	Hex Offset	Hex Value	Level
CPLREC99	0		1
CPL99BDY	13		2
CPL99EYE	13		3
CPL99KEY	0		2
CPL99OCC	18		3
CPL99TOK	2		3
CPL99TYP	0		3
CPL99VER	17		3

---

## CSUM - Summary of completed/deleted applications report in DP

Name : DCLCSUM

Function:

Describes layout of summary of completed/ deleted occurrence records. There is one record per Priority and day. The records have the standard recsize and keysize of dpin records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	158	CSUAREA	PARALLEL SERV   R1   R2 REC
0	(0)	CHARACTER	114	CSUKEY	KEY
0	(0)	SIGNED	2	CSUTYPE	ALWAYS TYPE 4

## CSUM - Summary of completed/deleted applications report in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
2	(2)	CHARACTER	34	*	ADJUST KEY
36	(24)	CHARACTER	6	CSUDATE	DATE IN ISO FORMAT
42	(2A)	SIGNED	2	CSURPRI	REVERSED PRIORITY PRI 9 -> 10 - 9 = 1 PRI 8 -> 10 - 8 = 2 ETC. TOTAL -> 10 - 0 = 10
44	(2C)	CHARACTER	70	*	TO ADD UP THE KEY
114	(72)	CHARACTER	44	CSUDATA	DATA PART OF CSU RECORD
114	(72)	CHARACTER	1	CSUPRI	OCCURENCE PRIORITY
115	(73)	CHARACTER	6	CSUCOMP	NUMBER OF COMPLETED OCC. CSURPRI=10 COMPLET+DELETED
121	(79)	CHARACTER	5	CSURERUN	NUMBER OF RERUN OCC.
126	(7E)	CHARACTER	5	CSUDELET	NUMBER OF DELETED OCC.
131	(83)	CHARACTER	5	CSULATEI	LATE ARRIVAL OCC.
136	(88)	CHARACTER	4	CSUI	AVERAGE LATE ARRIVAL
136	(88)	CHARACTER	2	CSUIHH	(HH )
138	(8A)	CHARACTER	2	CSUIMM	( MM)
140	(8C)	CHARACTER	5	CSULATEO	LATE COMPLETION
145	(91)	CHARACTER	4	CSUO	AVERAGE LATE COMPLETION
145	(91)	CHARACTER	2	CSUOHH	(HH )
147	(93)	CHARACTER	2	CSUOMM	( MM)
149	(95)	CHARACTER	5	CSUEARLO	EARLY COMPLETION
154	(9A)	CHARACTER	4	CSUE	AVERAGE EARLY COMPLETION
154	(9A)	CHARACTER	2	CSUEHH	(HH )
156	(9C)	CHARACTER	2	CSUEMM	( MM)

### Cross reference

Name	Hex Offset	Hex Value	Level
CSUAREA	0		1
CSUCOMP	73		3
CSUDATA	72		2
CSUDATE	24		3
CSUDELET	7E		3
CSUE	9A		3
CSUEARLO	95		3
CSUEHH	9A		4
CSUEMM	9C		4
CSUI	88		3
CSUIHH	88		4
CSUIMM	8A		4
CSUKEY	0		2
CSULATEI	83		3
CSULATEO	8C		3
CSUO	91		3
CSUOHH	91		4
CSUOMM	93		4
CSUPRI	72		3
CSURERUN	79		3
CSURPRI	2A		3
CSUTYPE	0		3

## DAIOP - Daily operating plan report record in DP

Name : DCLDAIOP

Function:

Describes layout of daily\_op records representing report data on operations (and occurrences) in the New current plan. There is one daily op record for each operation and additionally one for each Predecessor after the 1st predecessor, e.g. operations with 1,2,3,4 preds give 1,1,2,3 daiop records. The records have the standard recsize and keysize of dpin records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	264	DAIAREA	DAILY_OP RECORD
0	(0)	CHARACTER	115	DAIKEY	KEY
0	(0)	SIGNED	2	DAITYPE	TYPE IS ALWAYS 2
2	(2)	CHARACTER	2	*	TO ADJUST TO ADIDOFF
4	(4)	CHARACTER	34	*	TO ADJUST TO ADIDOFF
38	(26)	CHARACTER	26	DAIOCCID	OCC IDENTIFICATION
38	(26)	CHARACTER	16	DAIADID	ADID OF OCC OF OPERATION
54	(36)	CHARACTER	10	DAIOCIA	OCCURRENCE IA® (AFTER MCP)
54	(36)	CHARACTER	6	DAIOCIAD	DAY (YYMMDD)
60	(3C)	CHARACTER	4	DAIOCIAT	TIME (HHMM)
60	(3C)	CHARACTER	2	DAIOCIAH	TIME (HH )
62	(3E)	CHARACTER	2	DAIOCIAM	TIME ( MM)
64	(40)	CHARACTER	10	DAIOPRS	OPERATION PLANNED START
64	(40)	CHARACTER	6	DAIOPRSD	DAY (YYMMDD)
70	(46)	CHARACTER	4	DAIOPRST	TIME (HHMM)
70	(46)	CHARACTER	2	DAIOPRSH	TIME (HH )
72	(48)	CHARACTER	2	DAIOPRSM	TIME ( MM)
74	(4A)	CHARACTER	1	DAIOPPRI	10 - OPERATION PRIORITY
75	(4B)	CHARACTER	7	DAIOPID	OPERATION ID
75	(4B)	CHARACTER	4	DAIWSID	WORKSTATION ID OF OPER.
79	(4F)	CHARACTER	3	DAIOPNO	OPERATION NUMBER
82	(52)	CHARACTER	33	DAIPRE	OPERATION PRED   OR BLANK
82	(52)	CHARACTER	16	DAIPREOC	PREDECESSOR ADID
98	(62)	CHARACTER	10	DAIPREIA	PREDECESSOR IA   BLANK
98	(62)	CHARACTER	6	DAIPREID	YYMMDD   BLANK
104	(68)	CHARACTER	2	DAIPREIH	HH   BLANK
106	(6A)	CHARACTER	2	DAIPREIM	MM   BLANK
108	(6C)	CHARACTER	4	DAIPREWS	PREDECESSOR WSID   BLANK
112	(70)	CHARACTER	3	DAIPREOP	PREDECESSOR OP NO   BLANK
115	(73)	CHARACTER	149	DAIDATA	DATA PART OF DAILY_OP RCD
115	(73)	CHARACTER	10	DAIADIA	OCC ORIGINAL IA
115	(73)	CHARACTER	6	DAIADIAD	DAY (YYMMDD)
121	(79)	CHARACTER	4	DAIADIAT	TIME (HHMM)
121	(79)	CHARACTER	2	DAIADIAH	TIME (HH )
123	(7B)	CHARACTER	2	DAIADIAM	TIME ( MM)
125	(7D)	CHARACTER	10	DAIOCDL	OCCURRENCE DEADLINE
125	(7D)	CHARACTER	6	DAIOCDLD	DAY (YYMMDD)
131	(83)	CHARACTER	4	DAIOCDLT	TIME (HHMM)
131	(83)	CHARACTER	2	DAIOCDLH	TIME (HH )
133	(85)	CHARACTER	2	DAIOCDLM	TIME ( MM)
135	(87)	CHARACTER	1	DAIOCPRI	OCCURRENCE PRIORITY
136	(88)	CHARACTER	1	DAIOCSTA	OCC STATUS S   A   W   U
137	(89)	CHARACTER	1	DAIOCRER	Y=OCC RERUN, ELSE N



## DAIOP - Daily operating plan report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
138	(8A)	CHARACTER	16	DAIOCOWI	APPLICATION OWNER
154	(9A)	CHARACTER	24	DAIOCTXT	OCCURRENCE TEXT
178	(B2)	CHARACTER	8	DAIOPJOB	OPERATION JOBNAME
186	(BA)	CHARACTER	24	DAIOPTXT	OPERATION TEXT
210	(D2)	CHARACTER	2	DAIOPSPR	OPERATION SPECIAL RESOURCE
212	(D4)	CHARACTER	4	DAIOPDUR	OPERATION DURATION HHMM REMAINING
216	(D8)	CHARACTER	10	DAIOPDL	OPERATION SPEC DEADLINE
216	(D8)	CHARACTER	6	DAIOPDL D	DAY (YYMMDD)   BLANK
222	(DE)	CHARACTER	4	DAIOPDL T	TIME (HHMM)   BLANK
222	(DE)	CHARACTER	2	DAIOPDL H	TIME (HH )
224	(E0)	CHARACTER	2	DAIOPDL M	TIME ( MM)
226	(E2)	CHARACTER	1	DAIOPST	OPERATION STATUS
227	(E3)	CHARACTER	1	DAIOPRER	Y=OPR PLANNED TO RERUN
228	(E4)	CHARACTER	1	DAIOPMON	Y=OPERATION IS MONITORED
229	(E5)	CHARACTER	35	*	TO ADD UP TO STD REC SIZE

### Cross reference

Name	Hex Offset	Hex Value	Level
DAIADIA	73		3
DAIADIAD	73		4
DAIADIAH	79		5
DAIADIAM	7B		5
DAIADIAT	79		4
DAIADID	26		4
DAIAREA	0		1
DAIDATA	73		2
DAIKEY	0		2
DAIOCCID	26		3
DAIOCDL	7D		3
DAIOCDLD	7D		4
DAIOCDLH	83		5
DAIOCDLM	85		5
DAIOCDLT	83		4
DAIOCIA	36		4
DAIOCIAD	36		5
DAIOCIAH	3C		6
DAIOCIAM	3E		6
DAIOCIAT	3C		5
DAIOCOWI	8A		3
DAIOCPRI	87		3
DAIOCRER	89		3
DAIOCSTA	88		3
DAIOCTXT	9A		3
DAIOPDL	D8		3
DAIOPDL D	D8		4
DAIOPDL H	DE		5
DAIOPDL M	E0		5
DAIOPDL T	DE		4
DAIOPDUR	D4		3

## DAIOP - Daily operating plan report record in DP

Name	Hex Offset	Hex Value	Level
DAIOPID	4B		3
DAIOPJOB	B2		3
DAIOPMON	E4		3
DAIOPNO	4F		4
DAIOPPRI	4A		3
DAIOPRER	E3		3
DAIOPRS	40		3
DAIOPRSD	40		4
DAIOPRSH	46		5
DAIOPRSM	48		5
DAIOPRST	46		4
DAIOPSPR	D2		3
DAIOPST	E2		3
DAIOPTXT	BA		3
DAIPRE	52		3
DAIPREIA	62		4
DAIPREID	62		5
DAIPREIH	68		5
DAIPREIM	6A		5
DAIPREOC	52		4
DAIPREOP	70		4
DAIPREWS	6C		4
DAITYPE	0		3
DAIWSID	4B		4

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## DOA - Dynamic operation area

Name : DCLDOA

Function:

This segment declares the dynamic operation area. A DOA is either on the DOA free chain or it is chained to a WQA. A DOA chained to a WQA represents an operation in progress at the workstation defined by that WQA. The information in the DOA is used to build the ready list row for an operation in a workstation ready list display and by the workstation analyzer in order to find the next operation to be scheduled.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	192	DOA	DYNAMIC OPERATION AREA
0	(0)	CHARACTER	4	DOADESC	BLOCK DESCRIPTOR = 'DOA '
4	(4)	CHARACTER	2	DOAVER	BLOCK MAPPING VERSION
6	(6)	BITSTRING	2	DOAFLAGS	DOA FLAGS
				DOACLATE	1: CANCEL OPER IF LATE
				DOAURG	1: OPER IS URGENT
				DOASTAMR	1: STATUS SET MANUALLY
				DOATJT	1: TIME JOB OPERATION
				DOASFAIL	1: SUBMIT/RELEASE FAILED
				DOAARSET	1: OPER WAS AUTO RESET
				DOAEVENT	1: A JT EVENT WAS FOUND
				DOASTART	1: JOB HAS STARTED EXEC
7	(7)			DOAJSUB	1: AUTO SUBMIT THIS JOB
				DOAJHRC	1: JOB LEVEL HIGH RC DEF

## DOA - Dynamic operation area

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				DOADURMS	1: MAX DUR EXCEEDED
				DOAORER	1: OPER IS REROUTEABLE
				DOAORES	1: OPER IS RESTARTABLE
				DOAWRER	1: OPER WAS REROUTED
				DOARMSG	1: RER FAILD MSG ISSUED
				DOANHLD	1: SHOULDN'T BE RELEASED
8	(8)	CHARACTER	1	DOASTATE	OPERATION STATUS
9	(9)	CHARACTER	1	DOAClass	JOB OR SYSOUT CLASS
10	(A)	CHARACTER	1	DOAOIST	OPI STATUS (Y N + 0)
11	(B)	BITSTRING	1	DOAFLAG2	FLAG BYTE
				DOADWTO	DEADLINE WTO WANTED
				DOADWTOS	DEADLINE WTO SENT
				DOADWTOP	DEADLINE WTO PROCESSED
				DOAREMOV	SET OPER TO C OR E
				DOAMHLD	ON=MANUALLY HELD OP
				DOANOP	ON=NOP OP
				DOAEXEC	ON=EXECUTE OPERATION
				DOACLNCM	ON=CLEAN UP COMMAND ISSUED
12	(C)	CHARACTER	4	DOACPTR	INDEX TO OPERATION RECORD
12	(C)	UNSIGNED	3	DOAOCCX	OCCURRENCE INDEX
15	(F)	UNSIGNED	1	DOAOPNO	OPERATION NUMBER
16	(10)	CHARACTER	8	DOAJOBN	JOBNAME (FOR CPU OPER)
24	(18)	ADDRESS	4	DOANXT	PTR TO NEXT DOA
28	(1C)	ADDRESS	4	DOAPRE	PTR TO PREVIOUS DOA
32	(20)	ADDRESS	4	DOANXTTJ	NEXT TIME JOB IN TJT
36	(24)	ADDRESS	4	DOAPRETJ	PREVIOUS TIME JOB
40	(28)	ADDRESS	4	DOAWQAP	ADDR OF WQA FOR THIS DOA
44	(2C)	ADDRESS	4	DOADRAP	ADDR OF DRA FOR THIS DOA
48	(30)	ADDRESS	4	DOAAWS_P	ALTERNATE WS ADDRESS
52	(34)	UNSIGNED	2	DOASSEQ#	SUBMIT SEQUENCE NUMBER
54	(36)	BITSTRING	2	*	RESERVED
56	(38)	SIGNED	4	DOADLMIN	DEADL. THIS OP. IN MINS
60	(3C)	CHARACTER	8	DOAFORM	FORM NUMBER
68	(44)	UNSIGNED	1	DOASCRRT	CENTRALIZED SCRIPT SEND RETRY
69	(45)	CHARACTER	1	DOAREJST	SHADOW JOB BIND STATUS
70	(46)	SIGNED	2	DOAHIRC	HIGHEST NON-ERROR RETCODE
72	(48)	CHARACTER	8	DOATIME	LAST CHANGE (TOD FORMAT)
80	(50)	SIGNED	2	DOANET	NETWORK ID FOR OPERATION
82	(52)	SIGNED	2	DOAPSERV	NUM PARALLEL SERVERS REQD
84	(54)	SIGNED	2	DOAR1	AMOUNT OF R1 REQUIRED
86	(56)	SIGNED	2	DOAR2	AMOUNT OF R2 REQUIRED
88	(58)	SIGNED	2	*	FREE
90	(5A)	SIGNED	2	DOAPRI	PRIORITY
92	(5C)	CHARACTER	10	DOAST	SUBMIT DATE + TIME
102	(66)	CHARACTER	10	DOALO	LATEST START FOR THIS OP
102	(66)	CHARACTER	6	DOALOD	DATE
108	(6C)	SIGNED	4	DOALOT	TIME
112	(70)	CHARACTER	10	DOAIA	INPUT ARRIVAL FOR THIS OCC
122	(7A)	CHARACTER	10	DOAPS	PLANNED START FOR THIS OP
122	(7A)	CHARACTER	6	DOAPSD	DATE
128	(80)	SIGNED	4	DOAPST	TIME

## DOA - Dynamic operation area

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
132	(84)	SIGNED	4	DOARELFT	TIME 1ST RLSE 1.048 S
136	(88)	UNSIGNED	1	DOA#REL	NUMBER OF RELEASE DONE
137	(89)	CHARACTER	4	DOAALTWS	ALTERNATE WS
141	(8D)	CHARACTER	1	DOACLNFLA	CLEAN UP FLAG
				DOAMORERUN	0=FIRST RUN 1=AT LEAST ONE RUN
				DOAJLINFO	0=JLINFO TO BE REQUESTED 1=JLINFO REQUESTED
				DOAOPINFO	0=LAST OPERINFO NOT AVAILABLE 1=LAST OPERINFO AVAILABLE
				DOAPSUDONE	0=PSU NOT COMPLETED 1=PSU COMPLETED
				DOAUSERSYS	1=NEED USER SYSOUT
				DOAIMMERR	1=IMM FROM ERROR STATUS
				DOACLMSG	1=MESSAGE ISSUED
				DOAPSUWAIT	1=WAIT FOR PSU DONE
142	(8E)	CHARACTER	1	DOACLNSTAT	CLEAN UP STATUS: BLANK=NONE S=STARTED C=COMPLETED E=ENDED IN ERROR
143	(8F)	BITSTRING	1	DOAFLAG3	FLAG BYTE
				DOACMD_FAIL	OP COMMAND FAIL FLAG
				DOARESUB	RESEND JCL FOR OPER
				DOACMRER	CATMGT BEFORE RERUN
				DOAOSI	OSI OPERATION
				DOASYSFAIL	JES SUB FAIL
				DOAEVHER	ERROR IN EVENT HANDLER
				DOASRKEP	KEEP ON ERROR
				DOASENQ	SECOND DLF ENQ DONE
				DOAEXPJCL	USE EXPANDED JCL
144	(90)	CHARACTER	1	DOAJRSTAT	JOBLOG RETRIEVAL STATUS BLANK= NO ACTION YET R=REQUESTED OPINFO W=WAITING OPINFO O=OPINFO AVAILABLE I = INITIATED S = STARTED (J0-EVT) C = COMPLETE(J2-EVT) E = ERROR (J2-EVT)
145	(91)	BITSTRING	1	DOAFLAG4	
				DOAWLMR	WLM ALREADY REQUEST
				DOACSCR	ON=HAS CENTRALIZED SCRIPT
				DOASENDING	ON=S-SENDING EXSTAT
				DOASUBER	ON=E-OSUF EXSTAT
				DOAERFAIL	ON=E-FAIL EXSTAT
				DOARECPRMP	ON=E-PRMPT EXSTAT
				DOARECJOB	ON=E RECOVERY JOB RUNNING
				DOARECRUN	ON=E/(R,S,C) NOT RESTART
146	(92)	CHARACTER	2	DOAWLM	WLM FIELDS
146	(92)	CHARACTER	1	DOAJCRT	WLM CRITICAL INDICAT.
147	(93)	CHARACTER	1	DOAJPOL	WLM POLICY
148	(94)	CHARACTER	2	*	RESERVED
150	(96)	CHARACTER	10	DOADL	DEADLINE FOR THIS OPR
160	(A0)	CHARACTER	8	DOATOKEN_FULL	OPERATION FULL TOKEN
160	(A0)	CHARACTER	4	DOATOKEN_PRE	PREFIX

## DOA - Dynamic operation area

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
164	(A4)	UNSIGNED	4	DOATOKEN	OPCTOKEN
168	(A8)	SIGNED	4	DOAMAXD	MAX DURATION IN MINS
172	(AC)	UNSIGNED	4	DOADUR	DURATION IN HUNDREDS OF SECONDS
176	(B0)	ADDRESS	4	DOAPSUJCL	POINTER TO JCL
180	(B4)	CHARACTER	4	DOAPSUTOKEN	PSU REQUEST TOKEN
184	(B8)	CHARACTER	1	DOACLNTYP	CLEAN UP TYPE: A=AUTOMATIC I=IMMEDIATE M=MANUAL N=NONE
185	(B9)	BITSTRING	1	DOAFLAG5	BIT BATTERY
		1... ....		DOARECEND	ON=OPERATION COMPLETED BY RECOVERY
		.1.. ....		DOAEXPJCLUSED	ON=EXPANDED JCL USED
		..1. ....		DOAFROMPLC	ON=FROM PLC PROCESS
		...1 ....		DOAWASUJ	ON=SUBMITTED BY EQQWASUJ
		.... 1...		DOAWAITSE	ON=WAITING FROM SCHEDULING ENVIRONMENT
		.... .1..		DOAWAITWQA	ON=STARTED ON WAIT WORKSTATION
		.... ..1.		DOAURGMSG	ON=URGENT MESSAGE SENT
		.... ...1		DOAFTSANOP	ON=NOPPED ON STANDARD AGENT HOSTED BY MASTER
186	(BA)	BITSTRING	1	DOAFLAG6	RESERVED
		1... ....		DOAWLMPROM	ON=WLM PROMOTION DONE
		.1.. ....		DOAWLMMMSG	ON=WLM FAIL MESSAGE SENT
		..1. ....		DOANOEVAL	ON=DO NOT EVALUATE SUCCESSOR CONDITION
		...1 1111		*	RESERVED
187	(BB)	BITSTRING	1	DOAFLAG7	
		1... ....		DOASHADOW	ON=JOB IS A SHADOW JOB
		.1.. ....		DOACFBIND	ON=COMPLETE IF BIND FAILS
		..1. ....		DOAE113	E113 ISSUED
		...1 ....		DOAUNEXPRC	ON=UNEXPECTED RC
		.... 1...		DOADRECOV	ON=RECOVERY IN PROGRESS
		.... .1..		DOASHOSEQ	ON=SHADOW IN OSEQ
		.... ..11		*	
188	(BC)	ADDRESS	4	DOASEINFOP	ADDRESS OF DSEINFO AREA
192	(C0)	SIGNED	4	DOACRITPATH	CRITICAL PATH COUNTER
196	(C4)	CHARACTER	8	DOAWLMCLASS	WLM SERVICE CLASS
204	(CC)	CHARACTER	4	DOACRTPTHX	CRITICAL PATH ORIGIN KEY
204	(CC)	UNSIGNED	3	DOAPTHOC	OCCURRENCE NUMBER
207	(CF)	CHARACTER	1	DOAPTHOP	OPERATION NUMBER
208	(D0)	ADDRESS	4	DOASAINFOP	SA INFORMATION ADDRESS
212	(D4)	CHARACTER	4	*	RESERVED
220	(DC)	SIGNED	4	DOAMAXDSEC	MAX DURATION IN SEC
224	(E0)	CHARACTER	4	DOAERRCODE	ERROR CODE
228	(E4)	CHARACTER	8	DOASUBTOKEN	ZCENTRIC SUBMISSION TOKEN
236	(EC)	ADDRESS	4	DOASVIEWP	SVIEW PTR
240	(F0)	CHARACTER	4	*	RESERVED
244	(F4)	CHARACTER	4	*	RESERVED
248	(F8)	CHARACTER		DOAEND	END OF DOA

## DOA - Dynamic operation area

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	348	DSAINFO	LAYOUT OF SYSTEM AUTOMATION INFO AREA IN DOA
0	(0)	CHARACTER	4	DSAIEYE	EYE CATCHER, ALWAYS DSAI
4	(4)	CHARACTER	2	DSASVER	DSA VERSION
6	(6)	CHARACTER	2	*	FREE
8	(8)	ADDRESS	4	DSANEXT	POINTER TO NEXT DSA IN CHAIN
12	(C)	CHARACTER	336	DSAAUTOINFO	SYSTEM AUTOMATION INFO (SAI)
12	(C)	CHARACTER	256	DSACOMMTEXT	SA COMMAND TEXT
12	(C)	CHARACTER	64	DSACOMMTEXT1	SA COMMAND TEXT, LINE 1
76	(4C)	CHARACTER	64	DSACOMMTEXT2	SA COMMAND TEXT, LINE 2
140	(8C)	CHARACTER	64	DSACOMMTEXT3	SA COMMAND TEXT, LINE 3
204	(CC)	CHARACTER	64	DSACOMMTEXT4	SA COMMAND TEXT, LINE 4
268	(10C)	CHARACTER	8	DSAAUTOOPER	SA AUTOMATED FUNCTION (FOR OPERATION)
276	(114)	CHARACTER	8	DSASECELEM	SA SECURITY ELEMENT
284	(11C)	CHARACTER	64	DSACOMPINFO	SA COMPLETION INFO

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	4	*	LAYOUT OF TIME IN DOA
0	(0)	CHARACTER	2	DOAHOUR	HOUR
2	(2)	CHARACTER	2	DOAMINUT	MINUTE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	6	*	LAYOUT OF DATE IN DOA
0	(0)	CHARACTER	2	DOAYEAR	YEAR
2	(2)	CHARACTER	2	DOAMONTH	MONTH
4	(4)	CHARACTER	2	DOADAY	DAY

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	30	DSEINFO	
0	(0)	CHARACTER	40	DSEIEYE	DSEI
4	(4)	CHARACTER	2	DSEVER	01
6	(6)	CHARACTER	2	*	FREE
8	(8)	ADDRESS	4	DSENEXT	
12	(C)	CHARACTER	16	DSESENAME	SCHEDULING ENVIRONMENT
28	(1C)	SIGNED	2	DSESYSPLEXID	SYSPLEX ID

## Cross reference

Name	Hex Offset	Hex Value	Level
DOA	0		1
DOA#REL	88		2
DOAALTWS	89		2
DOAARSET	6	04	3
DOAAWS_P	30		2
DOACFBIND	BB	40	3
DOACCLASS	9		2

## DOA - Dynamic operation area

Name	Hex Offset	Hex Value	Level
DOACLATE	6	80	3
DOACLMSG	8D	02	3
DOACLNCM	B	01	3
DOACLNFLA	8D		2
DOACLNSTAT	8E		2
DOACLNTYP	B8		2
DOACMD_FAIL	8F	80	3
DOACPPTR	C		2
DOACRITPATH	C0		2
DOACRTPTHX	CC		2
DOACSCR	91	40	3
DOADAY	4		2
DOADESC	0		2
DOADL	96		2
DOADLMIN	38		2
DOADRAP	2C		2
DOADRECOV	BB	08	3
DOADUR	58		2
DOADURMS	7	20	3
DOADWTO	B	80	3
DOADWTOP	B	20	3
DOADWTOS	B	40	3
DOAEND	B8		2
DOAERFAIL	91	08	3
DOAEVENT	6	02	3
DOAEVHER	8F	04	3
DOAEXEC	B	02	3
DOAEXPJCL	8F	01	3
DOAEXPJCLUSED	B9	40	3
DOAE113	BB	20	3
DOAFLAGS	6		2
DOAFLAG2	B		2
DOAFLAG3	8F		2
DOAFLAG4	91		2
DOAFLAG5	B9		2
DOAFLAG6	BA		2
DOAFLAG7	BB		2
DOAFORM	3C		2
DOAFROMPLC	B9	20	3
DOAFTSANOP	B9	01	3
DOAHIRC	46		2
DOAHOUR	0		2
DOAIA	70		2
DOAIMMERR	8D	04	3
DOAJCRT	92		3
DOAJHRC	7	40	3
DOAJLINFO	8D	40	3
DOAJOBN	10		2
DOAJPOL	93		3
DOAJRSTAT	90		2
DOAJSUB	7	80	3

## DOA - Dynamic operation area

Name	Hex Offset	Hex Value	Level
DOALO	66		2
DOALOD	66		3
DOALOT	6C		3
DOAMAXD	A8		2
DOAMHLD	B	08	3
DOAMINUT	2		2
DOAMONTH	2		2
DOAMORERUN	8D	80	3
DOANET	50		2
DOANHLD	7	01	3
DOANOEVAL	BA	20	3
DOANOP	B	04	3
DOANXT	18		2
DOANXTTJ	20		2
DOAOCCX	C		3
DOAOIST	A		2
DOAOLDJCL	B4		2
DOAOPINFO	8D	20	3
DOAOPNO	F		3
DOAORER	7	10	3
DOAORES	7	08	3
DOAOSI	8F	10	3
DOAPRE	1C		2
DOAPRETJ	24		2
DOAPRI	5A		2
DOAPS	7A		2
DOAPSD	7A		3
DOAPSERV	52		2
DOAPST	80		3
DOAPSUDONE	8D	10	3
DOAPSUJCL	80		2
DOAPSUTOKEN	B4		2
DOAPSUWAIT	8D	01	3
DOAPTHOC	CC		3
DOAPTHOP	CF		3
DOARECEND	B9	80	3
DOARECJOB	91	02	3
DOARECPRMP	91	04	3
DOARECRUN	91	01	3
DOAREJST	45		2
DOARELFT	84		2
DOAREMOV	B	10	3
DOARESUB	8F	40	3
DOARMSG	7	02	3
DOAR1	54		2
DOAR2	56		2
DOASAINFOP	D0		2
DOASCRRT	44		2
DOASEINFOP	BC		2
DOASENDING	91	20	3
DOASENQ	8F	01	3



## DOA - Dynamic operation area

Name	Hex Offset	Hex Value	Level
DOASFAIL	6	08	3
DOASHADOW	BB	80	3
DOASHOSEQ	BB	04	3
DOASRKEP	8F	02	3
DOASSEQ#	34		2
DOAST	5C		2
DOASTAMR	6	20	3
DOASTART	6	01	3
DOASTATE	8		2
DOASUBER	91	10	3
DOASUBTOKEN	E4		2
DOASVIEWP	EC		2
DOASYSSFAIL	8F	08	3
DOATIME	48		2
DOATJT	6	10	3
DOATOKEN	A4		3
DOATOKEN_FULL	A0		2
DOATOKEN_PRE	A0		3
DOATZOFF	58		2
DOATZONE	BA	04	3
DOAUNEXPRC	BB	10	3
DOAURG	6	40	3
DOAURGMSG	B9	02	3
DOAUSERSYS	8D	08	3
DOAVER	4		2
DOAWAITSE	B9	8	3
DOAWASUJ	B9	10	3
DOAWLM	92		2
DOAWLMCLASS	C4		2
DOAWLMMSG	BA	40	3
DOAWLMPROM	BA	80	3
DOAWLMR	91	80	3
DOAWQAP	28		2
DOAWRER	7	04	3
DOAYEAR	0		2
DSAAUTOINFO	C		2
DSAAUTOOPER	10C		3
DSACOMMTEXT	C		3
DSACOMMTEXT1	C		4
DSACOMMTEXT2	4C		4
DSACOMMTEXT3	8C		4
DSACOMMTEXT4	CC		4
DSACOMPINFO	11C		3
DSAEYE	0		2
DSAINFO	0		1
DSANEXT	8		2
DSASECELEM	114		3
DSAVER	4		2
DSEEYE	0		2
DSEINFO	0		1
DSENEXT	8		2

## DOA - Dynamic operation area

Name	Hex Offset	Hex Value	Level
DSESENAME	C		2
DSESYSLEXID	1C		2
DSEVER	4		2
DSEVER	4		2

## DPH - Daily plan report header record

Name : DCLDPH

Function:

Describes layout of a header record written in all DP plans to describe general data about the planning run. The record has the standard recsize and keysize of DPIN records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	273	DPHAREA	HEADER RECORD
0	(0)	CHARACTER	114	DPHKEY	KEY
0	(0)	SIGNED	2	DPHTYPE	ALWAYS TYPE 1
2	(2)	SIGNED	2	DPHSTYPE	SUBTYPE 1=DPREC, 2=DPRES
4	(4)	CHARACTER	34	*	ADJUST FOR ADID
38	(26)	CHARACTER	76	*	TO ADD UP TO STD KEYSIZE
114	(72)	CHARACTER	159	DPHDATA	DATA PART OF DPH REC
114	(72)	CHARACTER	1	DPHPTYPE	TYPE OF PLANNING: 1 = TRIAL NEXT 2 = TRIAL REPLAN 3 = TRIAL FUTURE 4 = NEXT 5 = REPLAN 6 = NONREPORTING 7 = CP RESULTS
115	(73)	CHARACTER	1	DPHNCP	NEW NCP Y N
116	(74)	CHARACTER	1	DPHFEEDB	MISSED FEEDBACK REPORT Y N
117	(75)	CHARACTER	10	DPHOCP	USED OCP IDENTIFYER
117	(75)	CHARACTER	6	DPHOCPD	DATE (YYMMDD)
123	(7B)	CHARACTER	4	DPHOCP T	TIME (HHMM)
127	(7F)	CHARACTER	6	DPHLTP	USED LTP IDENTIFYER
127	(7F)	CHARACTER	6	DPHLTPD	DATE (YYMMDD)
133	(85)	CHARACTER	10	DPHSALG	PLANNING START (ALGORITHM)
133	(85)	CHARACTER	6	DPHSALGD	DATE (YYMMDD)
139	(8B)	CHARACTER	4	DPHSALGT	TIME (HHMM)
143	(8F)	CHARACTER	10	DPHSUSE	PLANNING START (USER)
143	(8F)	CHARACTER	6	DPHSUSED	DATE (YYMMDD)
149	(95)	CHARACTER	4	DPHSUSET	TIME (HHMM)
153	(99)	CHARACTER	10	DPHPLNT	TAIL PERIOD END
153	(99)	CHARACTER	6	DPHPLNTD	DATE (YYMMDD)
159	(9F)	CHARACTER	4	DPHPLNTT	TIME (HHMM)
163	(A3)	CHARACTER	10	DPHSREP	REPORT PERIOD START (RES)
163	(A3)	CHARACTER	6	DPHSREPD	DATE (YYMMDD)
169	(A9)	CHARACTER	4	DPHSREPT	TIME (HHMM)
173	(AD)	CHARACTER	10	DPHEREP	REPORT PERIOD END (RES)
173	(AD)	CHARACTER	6	DPHEREPD	DATE (YYMMDD)
179	(B3)	CHARACTER	4	DPHEREPT	TIME (HHMM)
179	(B3)	CHARACTER	2	DPHEREPH	HH

## DPH - Daily plan report header record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
181	(B5)	CHARACTER	2	DPHEREPM	MM
183	(B7)	CHARACTER	10	DPHEUSE	PLANNING END (USER)
183	(B7)	CHARACTER	6	DPHEUSED	DATE (YYMMDD)
189	(BD)	CHARACTER	4	DPHEUSET	TIME (HHMM)
193	(C1)	CHARACTER	6	DPHROPT	OPTIONS
193	(C1)	CHARACTER	1	DPHWSACT	110
194	(C2)	CHARACTER	1	DPHDAIOP	110
195	(C3)	CHARACTER	1	DPHALLWS	110
196	(C4)	CHARACTER	1	DPH1STWS	110
197	(C5)	CHARACTER	1	DPHNONRE	110
198	(C6)	CHARACTER	1	DPHCPRES	110
199	(C7)	CHARACTER	2	DPHROPTRU	OPTIONS, RES UTILIZATION
199	(C7)	CHARACTER	1	DPHPLNRU	PLANNED RES UTILIZ 110
200	(C8)	CHARACTER	1	DPHACTRU	ACTUAL RES UTILIZ 110
201	(C9)	CHARACTER	1	DPHCRIT	Y=REPORT PRESENT
202	(CA)	CHARACTER	8	DPH#MSG	DPIN MESSAGE COUNTERS
202	(CA)	SIGNED	2	DPH#MSGE	ERROR
204	(CC)	SIGNED	2	DPH#MSGW	WARNING
206	(CE)	SIGNED	2	DPH#MSGI	INFORMATION
208	(D0)	SIGNED	2	DPH#MSGU	UNRECOVERABLE
210	(D2)	UNSIGNED	4	DPH#OCCS	NUMBER OF PLANNED OCC
214	(D6)	UNSIGNED	4	DPH#OPS	NUMBER OF PLANNED OPS
218	(DA)	CHARACTER	55	*	ADD UP TO STD REC SIZE

## Cross reference

Name	Hex Offset	Hex Value	Level
DPH#MSG	CA		3
DPH#MSGE	CA		4
DPH#MSGI	CE		4
DPH#MSGU	D0		4
DPH#MSGW	CC		4
DPH#OCCS	D2		3
DPH#OPS	D6		3
DPHACTRU	C8		4
DPHALLWS	C3		4
DPHAREA	0		1
DPHCPRES	C6		4
DPHCRIT	C9		3
DPHDAIOP	C2		4
DPHDATA	72		2
DPHEREP	AD		3
DPHEREPD	AD		4
DPHEREPH	B3		5
DPHEREPM	B5		5
DPHEREPT	B3		4
DPHEUSE	B7		3
DPHEUSED	B7		4
DPHEUSET	BD		4
DPHFEEDB	74		3
DPHKEY	0		2

## DPH - Daily plan report header record

Name	Hex Offset	Hex Value	Level
DPHLTP	7F		3
DPHLTPD	7F		4
DPHNCP	73		3
DPHNONRE	C5		4
DPHOCP	75		3
DPHOCPD	75		4
DPHOCPPT	7B		4
DPHPLNRU	C7		4
DPHPLNT	99		3
DPHPLNTD	99		4
DPHPLNTT	9F		4
DPHPTYPE	72		3
DPHROPT	C1		3
DPHROPTRU	C7		3
DPHSALG	85		3
DPHSALGD	85		4
DPHSALGT	8B		4
DPHSREP	A3		3
DPHSREPD	A3		4
DPHSREPT	A9		4
DPHSTYPE	2		3
DPHSUSE	8F		3
DPHSUSED	8F		4
DPHSUSET	95		4
DPHTYPE	0		3
DPHWSACT	C1		4
DPHISTWS	C4		4

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## DPIN or DPUT - Report record in DP

Name : DCLDPIN

Function:

Describes standard of layout for all daily planner report (including message) records. There are several record types but they all have the same key size and record size. The sort step that follows step1 of a daily planner run sorts the record on that key.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	558	DPINREC	DPIN RECORD
0	(0)	CHARACTER	114	DPIKEY	KEY OF DPIN RECORD

## DPIN or DPUT - Report record in DP

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
0	(0)	SIGNED	2	DPITYPE	1 = HEADER RECORD SUBTYPE (DPH) 1 = DPREC HDR SUBTYPE 2 = DPRES HDR 2 = DAILY_OP RECORD (DAIOP) 3 = WS PLAN RECORDS SUBTYPE (WSP) 1 = WSP_OP RCD SSTYPE 1 = OPENTIME SSTYPE 2 = OPERATION SUBTYPE 2 = WSP_FOP RCD SUBTYPE 3 = WSN RCD SUBTYPE 4 = WSN_R1 SUBTYPE 5 = WSN_R2 4 = SUMMARY TABLES RECORD (CSUM) 5 = COMPLETED OCCURRENCE   OP RECORD SUBTYPE (CAPP) 1 = OLD 24-H SUBTYPE 2 = CURR 24-H 6 = OPER IN ERROR REC (OPERR) 7 = WS ACTIVITY RECORD SUBTYPE (WSN) 1 = WSNA RCD SUBTYPE 2 = WSN_R1 SUBTYPE 3 = WSN_R2 8 = COMPLETED OCCURRENCE ERR REC. SUBTYPE (ERRS) 1 = ERROR SUM SUBTYPE 2 = TOTAL SUM 9 = MISSED FEEDBACK (MFB) 13 = PLANNED UTIL HISTO (PRUH) 17 = PLANNED UTIL REPORT (PRUT) 20 = ACTUAL UTIL REPORT SUBTYPE (ARU) 1 = INTERVAL SUBTYPE 5 = DETAIL 30 = ERROR MESSAGE REC (DPMSG) 40 = CRITICAL PATH (CRIRP)
2	(2)	CHARACTER	78	*	TO ADD UP TO STD KEYSIZE
80	(50)	CHARACTER	34	*	TO ADD UP TO NEW KZ
114	(72)	CHARACTER	444	DPIDATA	DATA PART OF DPIN RECORD
114	(72)	CHARACTER	444	*	TO ADD UP TO STD REC SIZE

## DQE - Data queue element

Name : DCLDQE

Function:

This segment maps queue elements for several queues. The mapping of the DQEDATA field varies depending on the value of DQETYPE. If data buffers are used (indicated by dqebptr ^= 0), they are always allocated in subpool 2 by queue adders, and are freed when no longer needed by queue servers.

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
0	(0)	STRUCTURE	152	DQE	DATA ROUTER Q ELEMENT
0	(0)	CHARACTER	4	DQEDESC	BLOCK DESCRIPTOR, DQE
4	(4)	CHARACTER	2	DQEVER	VERSION NUMBER, 01
6	(6)	BITSTRING	2	*	RESERVED FLAGS

## DQE - Data queue element

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
8	(8)	CHARACTER	3	DQETYPE	DATA TYPE
11	(B)	BITSTRING	1	DQEFLAGS	FLAGS
				DQEFLRES	RESET SEQDS
				DQECMEXS	CM EXECUTION SUSPENDED FOR THIS ELEMENT
				DQENCKPT	DON'T CHKPT THIS SUBMIT
				DQEPACE	PACE THE EVENT FLOOD
				DQENOEDP	NO EDP CHKPT FOR THIS EV
				*	RESERVED
				DQE23PSUS	FLAG FOR A2
				DQESPIN	ON = SPIN ENABLED OFF= SPIN DISABLED
12	(C)	ADDRESS	4	DQE ECBP	ADDR OF SERVICE REQUESTOR ECB
16	(10)	ADDRESS	4	DQEBPTR	EXTERNAL DATA BUFFER PTR
20	(14)	SIGNED	4	DQEBLEN	SIZE OF EXTERNAL BUFFER
24	(18)	CHARACTER	8	DQEDEST	DESTINATION ID
32	(20)	SIGNED	4	DQERMAX#	MAX # OF RECS PER CYC IN EDS
36	(24)	SIGNED	4	DQEBLTOT	TOTAL SIZE OF EXTERNAL BUFFER
40	(28)	SIGNED	2	DQEBSNBR	BUFFER SEQUENCE NUMBER
42	(2A)	SIGNED	2	DQEBSTOT	BUFFER SEQUENCE TOT NBR IN SEQ
44	(2C)	CHARACTER	100	DQEDATA	LOCAL DATA BUFFER
144	(90)	SIGNED	4	DQEADDER	ADDITIONAL RECS W BUFFER
148	(94)	CHARACTER	2	*	RESERVED
150	(96)	UNSIGNED	2	DQEEVTS#	CURRENT EVDS SUBMIT SEQ#
152	(98)	CHARACTER		DQEEEND	END OF DQE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQEEVT	EVENT DATA BUFFER MAPPING
0	(0)	SIGNED	2	DQENNUM	NODE NUMBER
2	(2)	SIGNED	2	DQERDRN	EVENT READER NUMBER IN NODE
4	(4)	CHARACTER	8	DQEPOS	EVENT DS POSITION
4	(4)	SIGNED	4	DQECYC#	WRITE CYCLE NUMBER
8	(8)	SIGNED	4	DQEREC#	RECORD NUMBER IN CYCLE
12	(C)	CHARACTER	8	DQERELD	RELEASE DESTINATION OR BLANK
20	(14)	CHARACTER	80	DQEEXR	EXIT RECORD, SEE DCLEXR

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	6	DQECLJ	CLJ DATA
0	(0)	CHARACTER	5	DQECLJOB	CLEANUP JOB PREFIX
5	(5)	CHARACTER	1	DQEDSCLAS	DATASTORE CLASS

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	20	DQERFW	RFW DATA
0	(0)	CHARACTER	8	DQERFWDEST	DESTINATION NAME
8	(8)	CHARACTER	8	DQEEDP	EDP INFORMATION
8	(8)	SIGNED	4	DQEEDPWCY#	WRITE CYCLE NUMBER
12	(C)	SIGNED	4	DQEEDPREC#	RECORD # OF LAST RECORD
16	(10)	SIGNED	4	DQERFWNUM	NODE NUMBER

## DQE - Data queue element

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	48	DQEREL	RELEASE JOB MAPPING
0	(0)	CHARACTER	8	DQERJBNM	JOB NAME
8	(8)	CHARACTER	8	DQERJBID	JOB NUMBER
16	(10)	CHARACTER	8	DQERCNJE	CURRENT NJE NODE
24	(18)	CHARACTER	8	DQERONJE	ORIGIN NJE NODE
32	(20)	UNSIGNED	2	DQEASEQ#	SUBMIT SEQUENCE #
34	(22)	CHARACTER	4	DQEAWSID	WORK STATION ID
38	(26)	UNSIGNED	2	*	RESERVED
40	(28)	SIGNED	4	DQEROJID	ORIGINAL JOB NUMBER
44	(2C)	CHARACTER	4	DQEASSNAM	CONTROLLER SUBSYSTEM NAME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQESUB	SUBMIT DATA MAPPING
0	(0)	CHARACTER	4	DQERUS	**RU OR BLANK
4	(4)	CHARACTER	8	DQETSO	TSO USER ID OR BLANK
12	(C)	CHARACTER	8	DQEJOB	JOB/STC NAME
20	(14)	SIGNED	4	DQENREC	NO OF JCL CARD IMAGES
24	(18)	CHARACTER	4	DQEWSID	WORK STATION ID
28	(1C)	CHARACTER	16	DQEADID	APPLICATION ID
44	(2C)	CHARACTER	10	DQEOCIA	OCCURRENCE INPUT ARRIVAL
54	(36)	SIGNED	2	DQEOPNUM	OPERATION NUMBER
56	(38)	CHARACTER	4	DQESSNAM	CONTROLLER SUBSYSTEM NAME
60	(3C)	UNSIGNED	2	DQESSEQ#	SUBMIT SEQUENCE #
62	(3E)	CHARACTER	8	DQEJID	JOB# OF LAST SUBBED JOB
70	(46)	SIGNED	2	DQEASID	JOB ASID
72	(48)	CHARACTER	8	DQETOKEN_FULL	OPERATION TOKEN
72	(48)	CHARACTER	4	DQETOKEN_PRE	OPERATION TOKEN PREFIX
72	(48)	CHARACTER	4	DQEOCCTOK1	OCC TOKEN PART 1
76	(4C)	UNSIGNED	4	DQETOKEN	OPERATION TOKEN
76	(4C)	CHARACTER	4	DQEOCCTOK2	OCC TOKEN PART 2
80	(50)	ADDRESS	4	DQEEOPTP	E2E OPTION USER AREA
84	(54)	CHARACTER	8	DQENETID	APPC NETID (FINAL DEST)
92	(5C)	CHARACTER	8	DQENETLU	APPC NETLU (FINAL DEST)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	20	DQERSSEQ#	SSEQ# SYNC REQUEST
0	(0)	CHARACTER	4	DQERWSID	WORK STATION ID
4	(4)	CHARACTER	8	DQECREAT	REQUEST EVT CREATION TIME
4	(4)	SIGNED	4	DQEDATE	DATE FORMAT (00YYDDDF)
8	(8)	SIGNED	4	DQETIME	TIME FORMAT (SECS*100)
12	(C)	CHARACTER	4	DQERSNAM	CONTROLLER SUBSYSTEM NAME
16	(10)	UNSIGNED	1	DQERSEQ#	REQUEST SEQUENCE # FROM W
17	(11)	BITSTRING	1	DQERFLG1	FLAGBYTE BYTE 1
				DQERASK	REQ FOR CURR EVDS SSEQ#
				DQERCOLD	COLD START THE WS
				DQERDLTE	REMOVE THE WS FROM EVDS
				DQERSET	REQ TO SET EVDS TO WSEQ#
				*	RESERVED
18	(12)	UNSIGNED	2	DQEWSEQ#	SUBMIT SEQUENCE # FROM WS

## DQE - Data queue element

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	18	DQECMINI	INITIALIZE CM FOR OPER
0	(0)	CHARACTER	8	DQECMJOB	JOB/STC NAME
8	(8)	SIGNED	4	DQECMOCC	OCCURRENCE NUMBER
12	(C)	SIGNED	4	DQECMOPR	OPERATION NUMBER
16	(10)	CHARACTER	2	DQECMRT	TASK ID REQUESTOR EM = EVENT MANAGER AR = AUTOMATIC RECOVERY GS = GENERAL SERVICE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQERFP	RODM REQUEST FOR PARMS
0	(0)	CHARACTER	8	DQERFPD	REQUESTOR DESTINATION
8	(8)	CHARACTER	92	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQERSL	RODM SUBSYSTEM LOST
0	(0)	CHARACTER	8	DQERSLDN	REQUESTOR DESTINATION
8	(8)	CHARACTER	4	DQERLSSN	SUBSYSTEM NAME
12	(C)	CHARACTER	88	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQECRT	CRIT PATH RECALC
0	(0)	CHARACTER	4	DQEWS	WORSTATION NAME
4	(4)	CHARACTER	1	DQESTATUS	OPERATION STATUS
5	(5)	CHARACTER	1	DQEEXSTAT	OPERATION EXTENDED STATUS
6	(6)	BITSTRING	1	DQEFLAGS2	FLAGS
		1... ..		DQENOPED	NOPED OPERATION
		.1.. ..		DQEMANHELD	OPERATION MANUALLY HELD
		..1. ....		DQEMHELDCH	FIRST DQE OF A SEQ
		...1 ....		DQENOPCH	LAST DQE OF A SEQ
		.... 1...		DQETMDCH	TIME DEP CHG
		.... .1..		DQETMDEP	TIME DEP
		.... ..1.		DQEOPIACH	OPERATION IA CHANGED
		.... ...1		*	FREE
7	(7)	BITSTRING	1	DQEFLAGS3	FREE
		1... ..		DQEISFIRST	FIRST DQE OF A SEQ
		.1.. ....		DQEADDJOB	ADD JOB TO DATASPACE
		..1. ....		DQEISLAST	LAST DQE OF A SEQ
		...1 1111		*	FREE
8	(8)	CHARACTER	8	DQEJOBNAME	HOB NAME
16	(10)	SIGNED	4	DQEJOBENIX	JOB TABLE ENTRY INDEX
20	(14)	CHARACTER	1	DQEJOBPTY	JOB PRIORITY
21	(15)	CHARACTER	1	DQEREQTYPE	MCP REQUEST TYPE STATUS CHANGE
22	(16)	CHARACTER	2	*	FREE
24	(18)	SIGNED	4	DQEINDPRED	PRED J TABLE ENTRY IX
28	(1C)	CHARACTER	1	DQEOLDSTAT	OPERATION OLD STATUS
29	(1D)	CHARACTER	1	DQECRITIND	CRITICAL INDICATOR
30	(1E)	CHARACTER	10	DQEINPARR	INPUT ARRIVAL TIME
30	(1E)	CHARACTER	6	DQEINPARRD	DATE



## DQE - Data queue element

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	CHARACTER	4	DQEINPARRT	TIME
40	(28)	CHARACTER	2	*	FREE
42	(2A)	CHARACTER	10	DQEDEADL	DEADLINE
42	(2A)	CHARACTER	6	DQEDEADLD	DATE
48	(30)	CHARACTER	4	DQEDEADLT	TIME
52	(34)	CHARACTER	2	*	FREE
54	(36)	CHARACTER	10	DQEASTART	ACTUAL START TIME
54	(36)	CHARACTER	6	DQEASTARTD	DATE
60	(3C)	SIGNED	4	DQEASTARTT	TIME
64	(40)	CHARACTER	2	*	FREE
66	(42)	CHARACTER	10	DQEAEND	ACTUAL END TIME
66	(42)	CHARACTER	6	DQEAENDD	DATE
72	(48)	SIGNED	4	DQEAENDT	TIME
76	(4C)	SIGNED	4	DQEDURATION	DURATION
80	(50)	SIGNED	4	DQEACTDUR	ACTUAL DURATION
84	(54)	CHARACTER	4	DQEOPRKEY	OPERATION INDEX
84	(54)	UNSIGNED	3	DQE OCCIDX	OCC NUMBER
87	(57)	UNSIGNED	1	DQEOPRIDX	OPERATION NUMBER
88	(58)	CHARACTER	4	DQEERRCODE	JOB ERROR CODE
92	(5C)	CHARACTER	4	DQEPREKEY	PRED OPERATION INDEX
92	(5C)	UNSIGNED	3	DQEPOCCIDX	OCC NUMBER
95	(5F)	UNSIGNED	1	DQEPOPRIDX	OPERATION NUMBER
96	(60)	CHARACTER	4	*	FREE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	40	DQECRTBUF	DQE TYPE CRT
0	(0)	CHARACTER	1	DQEWLMPOL	WLM POLICY
1	(1)	CHARACTER	5	*	FREE
6	(6)	CHARACTER	8	DQEWLMCLASS	WLM SERVICE CLASS
14	(E)	CHARACTER	10	DQELSTART	LATEST START
14	(E)	CHARACTER	6	DQELSTARTD	LATEST START DATE
20	(14)	SIGNED	4	DQELSTARTT	LATEST START TIME
24	(18)	CHARACTER	16	DQEOPIA	OPERATION IA
24	(18)	CHARACTER	6	DQEOPIAD	DATE
30	(1E)	CHARACTER	4	DQEOPIAT	TIME
34	(22)	CHARACTER	6	*	

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQE CR1	CRIT PATH RECALC
0	(0)	CHARACTER	1	DQESTATU1	OPERATION STATUS
1	(1)	CHARACTER	1	DQEEXSTAT1	OPER EXTENDED STATUS
2	(2)	CHARACTER	2	*	FREE
4	(4)	SIGNED	4	DQEJOBENI1	JOB TABLE ENTRY INDEX
8	(8)	CHARACTER	1	DQEREQTYP1	MCP REQUEST TYPE - STATUS CHANGE - LATE - LONG RUNNING
9	(9)	CHARACTER	1	DQEOLDSTA1	OPERATION OLD STATUS
10	(A)	BITSTRING	1	DQEFLGS4	FLAGS
		1... ..		DQEURGCH1	DOA URGENT QUEUE
		.1... ..		DQEDO AUR1	DOA URGENT QUEUE
		..1. ....		DQEWLMPRO1	WLM PROMOTION FLAG

## DQE - Data queue element

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
		...1 1111		*	FREE
11	(B)	CHARACTER	3	*	FREE
14	(E)	CHARACTER	10	DQEASTAR1	ACTUAL START TIME
14	(E)	CHARACTER	6	DQEASTAR1D	DATE
20	(14)	SIGNED	4	DQEASTAR1T	TIME
24	(18)	CHARACTER	2	*	FREE
26	(1A)	CHARACTER	10	DQEAEN1	ACTUAL END TIME
26	(1A)	CHARACTER	6	DQEAEN1D	DATE
32	(20)	SIGNED	4	DQEAEN1T	TIME
36	(24)	SIGNED	4	DQEAENDU1	ACTUAL DURATION
40	(28)	CHARACTER	4	DQEOPRKE1	OPERATION INDEX
40	(28)	UNSIGNED	3	DQEOCCID1	OCC NUMBER
43	(2B)	UNSIGNED	1	DQEOPRID1	OPER NUMBER
44	(2C)	CHARACTER	4	DQEERRCOD1	JOB ERROR CODE
48	(30)	CHARACTER	52	*	FREE
Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQEARC	DQE TYPE DATA STORE
0	(0)	CHARACTER	4	DQEARCTYP	SERVICE REQUIRED: LOG = GET OS JOBLOG SLO=GET STRUCTURED LOG OPI=ASKOPINFO SDEL=START DELETE OF OLD ENTRIES
4	(4)	CHARACTER	24	DQEARCJRKEY	JOB LOG RETRIEVAL KEY
4	(4)	CHARACTER	8	DQEARCJOBID	JOB LOG ID
12	(C)	CHARACTER	8	DQEARCJOBNA	JOB LOG NAME
20	(14)	SIGNED	4	DQEARCRDRD	JOB START RDR DATE
24	(18)	SIGNED	4	DQEARCRDRT	JOB START RDR TIME
28	(1C)	CHARACTER	8	DQEARCDEST	OUTPUT DESTINATION
36	(24)	CHARACTER	16	DQEARCADID	APPLICATION NAME
52	(34)	CHARACTER	10	DQEARCIA	IA DATE AND TIME
52	(34)	CHARACTER	6	DQEARCIADATE	IA DATE
58	(3A)	CHARACTER	4	DQEARCIATIME	IA TIME
62	(3E)	CHARACTER	4	DQEARCOPKEY	OPERATION VSAM KEY
62	(3E)	UNSIGNED	3	DQEARCOCC	OCC NUM
70	(46)	UNSIGNED	1	DQEARCOPR	OPR NUM
71	(47)	CHARACTER	2	DQEARCCALLER	EM=EVENT MANAGER WA=WORKSTATION ANALYZER AR=AUTOMATIC RECOVERY GS=GENERAL SERVER
73	(49)	CHARACTER	1	DQEARCFLA1	FLAGS (ASK OPERINFO)
		1... ....		ARC_PSUPOST	1=POST PSU
		.1.. ....		ARC_CLEANUP	1=STAND-ALONE CLEAN UP
		..1. ....		ARC_SL	1=STEPLIST REQUIRED
		...1 ....		ARC_DS	1=DSLIST REQUIRED
		.... 1...		ARC_EXPJCL	1=USE EXPANDED JCL
		.... .1..		ARC_BESTSTEP	1=START FROM BSTEP
		.... ..1.		ARC_NOASK	1=CP14NOSTR ON
		.... ...1		ARC_ASKSIMGDG	1=GDG SIM REQUIRED
74	(4A)	CHARACTER	8	*	FREE
82	(52)	CHARACTER	8	DQEARCUSER	ORIGINAL JOB USER
90	(5A)	CHARACTER	8	DQEARCEXDEST	EXECUTION DESTINATION
98	(62)	UNSIGNED	1	DQEARCOPIRET	RETRY COUNTER

## DQE - Data queue element

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
99	(63)	UNSIGNED	1	DQEARCARSTE#	AR RESTART STEP
Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	16	DQEARCBUF	EXTERNAL BUFFER FOR DQE TYPE DATA STORE
0	(0)	CHARACTER	8	DQEARCSTEPN	STEPNAME (AR)
8	(8)	CHARACTER	8	DQEARCPSTEPN	PROC STEP NAME
Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQEPSU	DQE TYPE DATA STORE
0	(0)	CHARACTER	4	DQEPSUTYP	SERVICE REQUIRED: APL=APPLY LOGIC CLN=STAND-ALONE CLEAN UP REM=RESUME SUSPENDED DEL=DELETE REQUEST
4	(4)	CHARACTER	45	DQEPSUCOMMON	
4	(4)	CHARACTER	2	DQEPSUCALLER	FL=FETCH JOBLOG GS=GENERAL SERVER EM=EVENT MANAGER
6	(6)	CHARACTER	8	DQEPSUJOBNA	JOB NAME
14	(E)	CHARACTER	9	DQEPSUOPKEY	OPERATION VSAM KEY
14	(E)	CHARACTER	8	DQEPSUOCC	OCCURRENCE TOKEN
22	(16)	UNSIGNED	1	DQEPSUOPR	OPERATION NUMBER
23	(17)	CHARACTER	16	DQEPSUADID	APPLICATION NAME
39	(27)	CHARACTER	10	DQEPSUIA	IA DATE AND TIME
39	(27)	CHARACTER	6	DQEPSUIADATE	IA DATE
45	(2D)	CHARACTER	4	DQEPSUIATIME	IA TIME
49	(31)	CHARACTER	8	DQEPSUUSER	TSO USERID
57	(39)	CHARACTER	4	DQEPSUTOKEN	GS REQUEST TOKEN
61	(3D)	CHARACTER	8	DQESTEPNAME	AR RESTART STEP
69	(45)	CHARACTER	8	DQEPSTEPNAME	AR RESTART PROC STEP
77	(4D)	CHARACTER	8	DQEPSUEXDEST	EXECUTION DESTINATION
85	(55)	CHARACTER	1	DQEPSUFLA1	
		1... ....		PSU_EXPJCL	1=USE EXPANDED JCL
		.1.. ....		PSU_SUSPEND	1=SUSPEND DQE
		..1. ....		PSU_OPERINFO	1=SL FROM BUFFER
		...1 ....		PSU_USERSYS	1=ADD USER SYSOUT
		.... 1...		PSU_SYMGDG	1=SIMULATE GDG
		.... .1..		PSU_ROOT	1=GDG ROOT LIST
		.... ..1.		PSU_BESTSTEP	1=START FROM BSTEP
		.... ...1		PSU_ASKSIMGDG	1=REQ SIMULATION
86	(56)	UNSIGNED	2	PSU_SLEN	SL LENGHT
88	(58)	UNSIGNED	3	PSU_DSLEN	DL LENGHT
91	(5B)	UNSIGNED	3	PSU_GDGLEN	SIM. DGD INFO
94	(5E)	UNSIGNED	2	PSU_ROOTLEN	ROOT LENGHT
96	(60)	SIGNED	4	PSU_JCLEN	JCL LENGTH
Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	DQEWLM	SUB WLM RESET REQUEST
0	(0)	CHARACTER	8	DQETSOW	TSO USER ID OR BLANK

## DQE - Data queue element

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
8	(8)	CHARACTER	8	DQEJOBW	JOB/STC NAME
16	(10)	CHARACTER	8	DQESVCNW	WLM HI PERF SERVICE CLASS
24	(18)	CHARACTER	4	DQEWSIDW	WORK STATION ID
28	(1C)	CHARACTER	16	DQEADIDW	APPLICATION ID
44	(2C)	CHARACTER	10	DQEOCIAW	OCCURRENCE INPUT ARRIVAL
44	(2C)	CHARACTER	6	DQEOCIAD	OCCURENCE IA DATE
50	(32)	CHARACTER	4	DQEOCIAT	OCCURENCE IA TIME
54	(36)	SIGNED	2	DQEOPNUMW	OPERATION NUMBER
56	(38)	CHARACTER	4	DQESSNAMW	CONTROLLER SUBSYSTEM NAME
60	(3C)	UNSIGNED	2	DQESSEQ#W	SUBMIT SEQUENCE #
62	(3E)	SIGNED	2	DQEASIDW	JOB ASID
64	(40)	SIGNED	4	DQERETCW	WLM PROMOTION REQUEST RC
68	(44)	SIGNED	2	DQERSNCW	WLM PROMOTION REQUEST RSN
70	(46)	CHARACTER	10	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	8	DQETCPIP	TCPIP EVENT MAPPING
0	(0)	ADDRESS	4	DQESOCKETIDPTR	
4	(4)	CHARACTER	4	DQESOCKETDOMAIN	
0	(0)	CHARACTER	18	DQECONFFILE	CONF FILE MAPING
0	(0)	CHARACTER	1	DQEREQUESTTYPE	
1	(1)	CHARACTER	3	*	
4	(4)	CHARACTER	4	DQEREQUESTCRC	
8	(8)	CHARACTER	8	DQEERCOWNERDEST	
16	(10)	SIGNED	2	DQEDTBDESTINDEX	
0	(0)	STRUCTURE	44	DQEHTTTPACTION	HTTP JOBLOG RETRIEVAL KILL QUERY JOB STATUS
0	(0)	CHARACTER	8	DQEHTOCCTOKEN	HTTP OCCURRENCE TOKEN
8	(8)	CHARACTER	8	DQEHTSUBTOKEN	HTTP SUBMISSION TOKEN
16	(10)	CHARACTER	8	DQEHTJOBNAME	HTTP JOB NAME
24	(18)	CHARACTER	4	DQEHTWSNAME	HTTP WS NAME
28	(1C)	CHARACTER	4	DQEHTSSNAME	HTTP SUBSYSTEM NAME
32	(20)	SIGNED	2	DQEHTOPNUM	HTTP OPERATION NUMBER
34	(22)	SIGNED	2	*	RESERVED
36	(24)	CHARACTER	8	DQEHTUSER	HTTP JOBLOG REQ USER

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQEHTNOTIFY	HTTP NOTIFY
0	(0)	CHARACTER	56	DQEHNALIAS	ALIAS
56	(38)	CHARACTER	4	DQEHNERRC	ERROR CODE (STAT E/F)
60	(3C)	CHARACTER	6	DQEHNSTARTD	START DATE
66	(42)	CHARACTER	6	DQEHNENDD	END DATE
72	(48)	SIGNED	4	DQEHNSTARTT	START TIME
76	(4C)	SIGNED	4	DQEHNENDT	END TIME
80	(50)	CHARACTER	8	DQEHNXDTOKEN	XD99 KEY
88	(58)	SIGNED	4	DQEHNADUR	DURATION IN SECONDS
92	(5C)	CHARACTER	1	DQEHNSTATUS	STATUS (S/S/C/F)
93	(5D)	CHARACTER	7	*	FREE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	DQEHTINFO	HTTP BIND INFO/FAILED
0	(0)	CHARACTER	56	DQEHIALIAS	ALIAS
56	(38)	CHARACTER	8	DQEHJOBNAME	MATCHED JOBNAME
64	(40)	CHARACTER	10	DQEHIA	MATCHED IA
64	(40)	CHARACTER	6	DQEHIAAD	IA DATE
70	(46)	CHARACTER	4	DQEHIAAT	IA TIME
74	(4A)	CHARACTER	1	DQEHITYPE	I=INFO, F=FAILED
75	(4B)	CHARACTER	1	DQEHIFLAGS	FLAGS
		1... ..		DQEHIBCP	ON: BIND IN CP
		.111 1111		*	..FREE
76	(4C)	CHARACTER	8	DQEHIXDTOKEN	XD99 KEY
84	(54)	CHARACTER	4	DQEHIEWSNAME	MATCHED WS NAME
88	(58)	CHARACTER	12	*	FREE
0	(0)	STRUCTURE	100	DQEHTSUBSCR	HTTP SUBSCRIBE
0	(0)	CHARACTER	35	DQEHSRKEYZ	REMOTE JOB KEY
0	(0)	CHARACTER	16	DQEHSADID	REMOTE ADID/JSNAME (D/Z)
16	(10)	CHARACTER	16	DQEHSJSWS	REMOTE JSWS (D)
32	(20)	CHARACTER	3	DQEHSOPNO	REMOTE OPNO (Z)
35	(23)	CHARACTER	1	DQEHSFLAGS	FLAGS
		1... ..		DQEHSZOS	ON: REMOTE ENGINE TYPE IS Z
		.1... ..		DQEHSRESUB	ON: RESUB FOR SYNC
		..11 1111		*	FREE
36	(24)	CHARACTER	2	*	FREE
38	(26)	CHARACTER	10	DQEHSIA	IA FOR MATCH
38	(26)	CHARACTER	6	DQEHSIAD	IA DATE
44	(2C)	CHARACTER	4	DQEHSIAT	IA TIME
48	(30)	CHARACTER	52	DQEHSALIAS	DATA FOR ALIAS
48	(30)	CHARACTER	8	DQEHSOCCTOKEN	OCCURRENCE TOKEN
56	(38)	CHARACTER	8	DQEHSSUBTOKEN	SUBMISSION TOKEN
64	(40)	CHARACTER	8	DQEHSJOBNAME	JOB NAME
72	(48)	CHARACTER	4	DQEHSWSNAME	WS NAME
76	(4C)	CHARACTER	4	DQEHSSSNAME	SUBSYSTEM NAME
80	(50)	SIGNED	2	DQEHSOPNUM	OPERATION NUMBER
82	(52)	CHARACTER	18	*	FREE
0	(0)	STRUCTURE	40	DQEHSBUFF	EXTERNAL BUFFER FOR DQE HTTP SUBSCRIBE
0	(0)	CHARACTER	40	DQEHSRJOBNM	REMOTE JOBNAME

## Cross reference

Name	Hex Offset	Hex Value	Level
ARC_CLEANUP	49	40	3
ARC_DS	49	10	3
ARC_EXPJCL	49	08	3
ARC_PSUPOST	49	80	3
ARC_SL	49	20	3
DQE	0		1
DQEADDER	90		2
DQEADID	1C		2
DQEADIDW	1C		2
DQEARC	0		1
DQEARCADID	24		2

## DQE - Data queue element

Name	Hex Offset	Hex Value	Level
DQEARCCALLER	47		2
DQEARCDEST	1C		2
DQEARCEXDEST	5A		2
DQEARCFLA1	49		2
DQEARCIA	34		2
DQEARCIADATE	34		3
DQEARCIATIME	3A		3
DQEARCJOBID	4		3
DQEARCJOBNA	C		3
DQEARCJRKEY	4		2
DQEARCOCC	3E		3
DQEARCOPIRET	62		2
DQEARCOPKEY	3E		2
DQEARCOPR	46		3
DQEARCPSTEPN	52		2
DQEARCRDRD	14		3
DQEARCRDRT	18		3
DQEARCSTEPN	4A		2
DQEARCTYP	0		2
DQEARCUSER	52		3
DQEASEQ#	20		2
DQEASID	46		2
DQEASIDW	3E		2
DQEASSNAM	2C		2
DQEAWSID	22		2
DQEBLEN	14		2
DQEBLTOT	24		2
DQEBPTR	10		2
DQEBSNBR	28		2
DQEBSTOT	2A		2
DQECLJ	0		1
DQECLJOB	0		2
DQEDSCLAS	5		2
DQECMEXS	B	40	3
DQECMINI	0		1
DQECMJOB	0		2
DQECMOCC	8		2
DQECMOPR	C		2
DQECMRT	10		2
DQECREAT	4		2
DQECYC#	4		3
DQEDATA	2C		2
DQEDATE	4		3
DQEDESC	0		2
DQEDEST	18		2
DQE ECBP	C		2
DQEEDP	8		2
DQEEDPREC#	C		3
DQEEDPWY#	8		3
DQEEND	98		2
DQEEOPTP	50		2

## DQE - Data queue element

Name	Hex Offset	Hex Value	Level
DQEERRCODE	58		2
DQEERRCOD1	2C		2
DQEEVT	0		1
DQEEVTS#	96		2
DQEEXR	14		2
DQEFLAGS	B		2
DQEFLRES	B	80	3
DQEHIALIAS	0		2
DQEHIBCP	4B	80	3
DQEHIFLAGS	4B		2
DQEHIIA	40		2
DQEHIIAD	40		3
DQEHIIAT	46		3
DQEHIJOBNAME	38		2
DQEHITYPE	4A		2
DQEHWSNAME	54		2
DQEHIXDTOKEN	4C		2
DQEHNADUR	58		2
DQEHNALIAS	0		2
DQEHNENDD	42		2
DQEHNENDT	4C		2
DQEHNERRC	38		2
DQEHNSTARTD	3C		2
DQEHNSTARTT	48		2
DQEHNSTATUS	5C		2
DQEHNXDTOKEN	50		2
DQEHSADID	0		3
DQEHSALIAS	30		2
DQEHSBUFF	0		1
DQEHSFLAGS	23		2
DQEHSIA	26		2
DQEHSIAD	26		3
DQEHSIAT	2C		3
DQHSJOBNAME	40		3
DQHSJSWS	10		3
DQHSOCCCTOKEN	30		3
DQHSOPNO	20		3
DQHSOPNUM	50		3
DQHSRESUB	23	40	2
DQHSRJOBNM	0		2
DQHSRKEYZ	0		3
DQHSSNAME	4C		3
DQHSSUBTOKEN	38		3
DQHSWSNAME	48		1
DQHSZOS	23	80	2
DQHTINFO	0		1
DQHTJOBNAME	0		1
DQHTNOTIFY	0		2
DQHTOCCCTOKEN	0		2
DQHTOPNUM	20		1
DQHTSSNAME	1C		2

## DQE - Data queue element

Name	Hex Offset	Hex Value	Level
DQEHTSUBSCR	0		1
DQEHTSUBTOKEN	8		2
DQEHTTPACTION	0		1
DQEHTUSER	24		2
DQEHTWSNAME	18		2
DQEINDPRED	18		2
DQEINPARR	1E		2
DQEINPARRD	1E		3
DQEINPARRT	24		3
DQEISFIRST	7		3
DQEISLAST	7		3
DQEJDEST	14		2
DQEJID	3E		2
DQEJOBENIX	10		2
DQEJOBENI1	4		2
DQEJOBN	C		2
DQEJOBNW	8		2
DQENCKPT	B	20	3
DQENETID	54		2
DQENETLU	5C		2
DQENNUM	0		2
DQENOEDP	B	08	3
DQENREC	14		2
DQEOCCTOK1	48		4
DQEOCCTOK2	4C		4
DQEOCIA	2C		2
DQEOCIAD	2C		3
DQEOCIAT	32		3
DQEOCIAW	2C		2
DQEOLDSTAT	1C		2
DQEOLDSTA1	9		2
DQEOPIA	18		2
DQEOPIACH	6	02	3
DQEOPIAD	18		3
DQEOPIAT	1E		3
DQEOPNUM	36		2
DQEOPNUMW	36		2
DQEOPRIDX	57		3
DQEOPRID1	2B		3
DQEOPRKEY	54		2
DQEOPRKE1	28		2
DQEPACE	B	10	3
DQEPOCCIDX	5C		3
DQEPOPRIIDX	5F		3
DQEPOS	4		2
DQEPREKEY	5C		2
DQEPSTEPNAME	45		2
DQEPSU	0		1
DQEPSUADID	17		3
DQEPSUCALLER	4		3
DQEPSUCOMMON	4		2



## DQE - Data queue element

Name	Hex Offset	Hex Value	Level
DQEPSUEXDEST	4D		2
DQEPSUFLA1	55		2
DQEPSUIA	27		3
DQEPSUIADATE	27		4
DQEPSUIATIME	2D		4
DQEPSUJOBNA	6		3
DQEPSULEN	58		2
DQEPSUOCC	E		4
DQEPSUOPKEY	E		3
DQEPSUOPR	16		4
DQEPSUTOKEN	39		2
DQEPSUTYP	0		2
DQEPSUUSER	31		2
DQERASK	11	80	3
DQERCNJE	10		2
DQERCOLD	11	40	3
DQERDLTE	11	20	3
DQERDRN	2		2
DQEREC#	8		3
DQEREL	0		1
DQERELD	C		2
DQERETCW	40		2
DQERFLG1	11		2
DQERFP	0		1
DQERFPD	0		2
DQERFW	0		1
DQERFWDEST	0		2
DQERFWNNUM	10		2
DQERJBID	8		2
DQERJBNM	0		2
DQERMAX#	20		2
DQEROJID	28		2
DQERONJE	18		2
DQERSEQ#	10		2
DQERSET	11	10	3
DQERSL	0		1
DQERSLDN	0		2
DQERLSSN	8		2
DQERSNCW	44		2
DQERSSEQ#	0		1
DQERSSNAM	C		2
DQERUS	0		2
DQERWSID	0		2
DQESPIN	B	01	3
DQESSEQ#	3C		2
DQESSEQ#W	3C		2
DQESSNAM	38		2
DQESSNAMW	38		2
DQESTEPNAME	3D		2
DQESUB	0		1
DQESVCNW	10		2

## DQE - Data queue element

Name	Hex Offset	Hex Value	Level
DQETIME	8		3
DQETMDCH	6	08	3
DQETMDEP	6	04	3
DQETOKEN	4C		3
DQETOKEN_FULL	48		2
DQETOKEN_PRE	48		3
DQETSO	4		2
DQETSOW	0		2
DQETYPE	8		2
DQEVER	4		2
DQEWLM	0		1
DQEWSEQ#	12		2
DQEWSID	18		2
DQEWSIDW	18		2
DQE23PSUS	B	02	3
PSU_DSLEN	5C		3
PSU_EXPJCL	55	80	3
PSU_JCLLEN	60		3
PSU_OPERINFO	55	20	3
PSU_ROOT	55	04	3
PSU_ROOTLEN	5E		2
PSU_SIMGDG	55	08	3
PSU_SLEN	58		3
PSU_SUSPEND	55	40	3
PSU_USERSYS	55	10	3

## EX2 - z/OS Agent Event record

Name : DCLEX2

Function:

This record ....

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EX2	zAgent event record
0	(0)	CHARACTER	1	EX2SYST	'2' event
1	(1)	CHARACTER	1	EX2TYPE	type event
2	(2)	UNSIGNED	1	EX2FLAGS	flags
		1... ..		EX2SUSPD	event suspended
		.1.. ..		EX2NUMERR	on: err code is numeric
		..1. ....		EX2DUMMY	on: dummy start date
		...1 1111		*	reserved
3	(3)	CHARACTER	1	*	reserved
4	(4)	CHARACTER	16	EX2TOKENS	
4	(4)	CHARACTER	8	EX2OCCTOKEN	occurrence token
12	(C)	CHARACTER	8	EX2SUBTOKEN	submission token
20	(14)	CHARACTER	8	EX2JOBNUM	job number
28	(1C)	CHARACTER	1	EX2JCLI	parse error Y/N
29	(1D)	CHARACTER	1	EX2UNKNOWN	unknown result Y/N
30	(1E)	SIGNED	2	EX2OPNUM	oper num

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
32	(20)	CHARACTER	4	EX2WSNAME	WS name
36	(24)	CHARACTER	8	EX2JOB	job name
44	(2C)	SIGNED	4	EX2DAT2	date 2
48	(30)	SIGNED	4	EX2CDAT	creation date (00yydddf)
52	(34)	SIGNED	4	EX2CTIM	creation time (sec*100)
56	(38)	SIGNED	4	EX2TIM2	time 2
60	(3C)	SIGNED	4	EX2ERRN	error code (integer)
60	(3C)	CHARACTER	4	EX2ERRC	used by Z remote engine
64	(40)	CHARACTER	4	EX2SUBSYS	Controller subsystem name
68	(44)	SIGNED	4	EX2ADUR	actual duration
72	(48)	CHARACTER	4	*	free
76	(4C)	CHARACTER	4	EX2OPCID	event id 'EQQx'

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EX2XD	XD actions layout ('X')
0	(0)	CHARACTER	1	EX2XDSYST	'2' event
1	(1)	CHARACTER	1	EX2XDTYPE	type event ('X')
2	(2)	UNSIGNED	1	EX2XDFLAGS	flags
		1... ..		EX2XDSUSPD	event suspended
		.1.. ..		EX2XDPCP	ON: req for waitcp
		..1. ....		EX2XDPLT	ON: req for waitlt
		...1 .....		EX2XDDPSET	ON: req for waitlt
		.... 1111		*	reserved
3	(3)	CHARACTER	1	EX2XDSUBT	D-notif. ended/remove XD F-failed to notify F-manage pending XD
4	(4)	CHARACTER	8	EX2XDTOKEN	xd99 key !_ keys used
12	(C)	CHARACTER	56	EX2XDALIAS	xd02 key ! alternatively
68	(44)	CHARACTER	8	*	free
76	(4C)	CHARACTER	4	EX2XDOPCID	event id 'EQQx'

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EX2JOBINFO	2I and 2B layout
0	(0)	CHARACTER	1	EX2ISYST	'2' event
1	(1)	CHARACTER	1	EX2ITYPE	type event
2	(2)	UNSIGNED	1	EX2IFLAGS	flags
		1... ..		EX2ISUSPD	event suspended
		.111 1111		*	reserved
3	(3)	CHARACTER	1	*	reserved
4	(4)	CHARACTER	16	EX2ITOKENS	
4	(4)	CHARACTER	8	EX2IOCCTOKEN	occurrence token
12	(C)	CHARACTER	8	EX2ISUBTOKEN	submission token
20	(14)	CHARACTER	8	EX2IJOBNAME	matched job name
28	(1C)	SIGNED	2	EX2IOPNUM	oper num
30	(1E)	CHARACTER	2	*	free
32	(20)	CHARACTER	4	EX2IWSNAME	matched WS name
36	(24)	CHARACTER	4	EX2ISUBSYS	Controller subsystem name
40	(28)	SIGNED	4	EX2IIAD	matched ia date
44	(2C)	SIGNED	4	EX2IIAT	matched ia time
48	(30)	CHARACTER	28	*	free
76	(4C)	CHARACTER	4	EX2IOPCID	event id 'EQQx'

## DCLEX2 - z/OS Agent Event record

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	80	EX2AGENTINFO	agent info event record	
0	(0)	CHARACTER	1	EX2AISYST	'2' event	
1	(1)	CHARACTER	1	EX2AITYPE	type event	
2	(2)	UNSIGNED	1	EX2AIFLAGS	flags	
		1... ..		EX2AISUSPD	event suspended	
		.111 1111		*	reserved	
3	(3)	CHARACTER	1	EX2AINEWSTAT	A   O (active or offline)	
4	(4)	SIGNED	4	EX2AIFPLEVEL	fix pack level	
8	(8)	CHARACTER	8	EX2AIDEST	destination name	
16	(10)	CHARACTER	8	EX2AIVERSION	agent version	
24	(18)	CHARACTER	16	EX2AIOSNAME	op. system	
40	(28)	CHARACTER	16	EX2AIOSLEVEL	op. system level	
56	(38)	SIGNED	2	EX2AIDUMMYCHG	first active	
58	(3A)	SIGNED	2	*	reserved	
60	(3C)	CHARACTER	16	*	reserved	
76	(4C)	CHARACTER	4	EX2AIOPCID	event id 'EQQx'	

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	80	EX2JOBLOG	agent info event record	
0	(0)	CHARACTER	1	EX2JLSYST	'2' event	
1	(1)	CHARACTER	1	EX2JLTYPE	type event	
2	(2)	UNSIGNED	1	EX2JLFLAGS	flags	
		1... ..		EX2JLSUSPD	event suspended	
		.111 1111		*	reserved	
3	(3)	CHARACTER	1	EX2JLSTATUS	job log req status C   E	
4	(4)	CHARACTER	8	EX2JLOCCTOKEN	occurrence token	
12	(C)	CHARACTER	8	EX2JLUSER	job request user	
20	(14)	ADDRESS	4	EX2JLBUFPTR	job log buffer	
24	(18)	ADDRESS	4	EX2JLBUFLLEN	job log buffer length	
28	(1C)	SIGNED	2	EX2JLOPNUM	operation number	
30	(1E)	CHARACTER	2	*	reserved	
32	(20)	SIGNED	4	EX2JLLENGTH	joblog length	
36	(24)	CHARACTER	40	*	reserved	
76	(4C)	CHARACTER	4	EX2JLOPCID	event id 'EQQx'	

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	100	EX2BIND	subscription (bind) req	
0	(0)	CHARACTER	1	EX2BSYST	'2' event	
1	(1)	CHARACTER	1	EX2BTYPE	'Y' type event	
2	(2)	UNSIGNED	1	EX2BFLAGS	flags	
		1... ..		EX2BSUSPD	event suspended	
		.111 1111		*	reserved	
3	(3)	CHARACTER	1	*	free	
4	(4)	CHARACTER	18	EX2BTOMATCH		
4	(4)	CHARACTER	16	EX2BADID	application id	
20	(14)	SIGNED	2	EX2BOPNUM	operation number	
22	(16)	SIGNED	2	EX2BDESTNUM	number of backup dests	
24	(18)	CHARACTER	8	EX2BIA	input arrival for match	
24	(18)	SIGNED	4	EX2BIAD	date (00yydddf)	
28	(1C)	SIGNED	4	EX2BIAT	time (sec*100)	

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
32	(20)	CHARACTER	56	EX2BALIAS	alias
88	(58)	CHARACTER	8	EX2BDEST1	first destination name
96	(60)	ADDRESS	4	EX2BXPTR	ptr to extended part

C code allocates only one buffer: the extended part always follows the fixed part. Used ptr instead of char(0) for an easier addition of new fields in the event.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	EX2BEXT	subscription ext part
0	(0)	CHARACTER	8	EX2BDESTS(*)	backup destinations
0	(0)	CHARACTER	8	EX2DESTNM	dest name

Events constants

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
1		CHARACTER	2	EX2EVENT	z-Centric Event Type
1		CHARACTER	P	EX2SPEVE	submit - post executed
1		CHARACTER	T	EX2STEVE	submit - post failed
1		CHARACTER	s	EX2SBEVE	submitted
1		CHARACTER	S	EX2SEEVE	start execution
1		CHARACTER	C	EX2JCEVE	job completed successfully
1		CHARACTER	K	EX2JKEVE	job killed
1		CHARACTER	E	EX2EEEVE	job ended in error (exec)
1		CHARACTER	e	EX2EREVE	recovery in progress
1		CHARACTER	F	EX2EFEVE	submission failed
1		CHARACTER	U	EX2UUEVE	job status unknown
1		CHARACTER	R	EX2RREVE	reset job status to ready
1		CHARACTER	B	EX2BFEVE	bind failed event
1		CHARACTER	I	EX2BIEVE	bind ok event
1		CHARACTER	Y	EX2BREVE	bind request
1		CHARACTER	O	EX2OOEVE	online/offline event
1		CHARACTER	L	EX2JLEVE	joblog retrieval
1		CHARACTER	X	EX2XDEVE	manage XD
1		CHARACTER	C	EX2JLCOM	joblog retrieval complete
1		CHARACTER	E	EX2JLERR	joblog retrieval error
1		CHARACTER	S	EX2JLSUS	joblog retrieval suspend
1		CHARACTER	P	EX2XDPND	check pending
1		CHARACTER	K	EX2XDKLL	kill bind request
1		CHARACTER	F	EX2XDERR	failed to notify mark XD failed
1		CHARACTER	D	EX2XDDEL	notification completed remove XD
1		CHARACTER	A	EX2_DESTACT	destination status active
1		CHARACTER	O	EX2_DESTOFF	destination status offline
1		CHARACTER	P	EX2BRPRE	matching criteria closest preceding
1		CHARACTER	I	EX2BRINT	matching criteria interval

## Cross reference

Name	Hex Offset	Hex Value	Level
EX2	0		1

## DCLEX2 - z/OS Agent Event record

Name	Hex Offset	Hex Value	Level
EX2ADUR	44		2
EX2AGENTINFO	0		1
EX2AIDEST	8		2
EX2AIDUMMYCHG	38		2
EX2AIFLAGS	2		2
EX2AIFPLEVEL	4		2
EX2AINEWSTAT	3		2
EX2AIOPCID	4C		2
EX2AIOSLEVEL	28		2
EX2AIOSNAME	18		2
EX2AISUSPD	2	80	3
EX2AISYST	0		2
EX2AITYPE	1		2
EX2AIVERSION	10		2
EX2BADID	4		3
EX2BALIAS	20		2
EX2BDESTNUM	16		2
EX2BDESTS	0		2
EX2BDEST1	58		2
EX2BEXT	0		1
EX2BFLAGS	2		2
EX2BIA	18		2
EX2BIAD	18		3
EX2BIAT	1C		3
EX2BIND	0		1
EX2BOPNUM	14		3
EX2BSUSPD	2	80	3
EX2BSYST	0		2
EX2BTOMATCH	4		2
EX2BTYP	1		2
EX2BXPTR	60		2
EX2CDAT	30		2
EX2CTIM	34		2
EX2DAT2	2C		2
EX2DESTNM	0		3
EX2DUMMY	2	20	3
EX2ERRC	3C		3
EX2ERRN	3C		2
EX2FLAGS	2		2
EX2IFLAGS	2		2
EX2IIAD	28		2
EX2IIAT	2C		2
EX2IJOBNAME	14		2
EX2IOCCTOKEN	4		3
EX2IOPCID	4C		2
EX2IOPNUM	1C		2
EX2ISUBSYS	24		2
EX2ISUBTOKEN	C		3
EX2ISUSPD	2	80	3
EX2ISYST	0		2
EX2ITOKENS	4		2

## DCLEX2 - z/OS Agent Event record

Name	Hex Offset	Hex Value	Level
EX2ITYPE	1		2
EX2IWSNAME	20		2
EX2JCLI	1C		2
EX2JLBUFLEN	18		2
EX2JLBUFPTR	14		2
EX2JLFLAGS	2		2
EX2JLENGTH	20		2
EX2JLOCCTOKEN	4		2
EX2JLOPCID	4C		2
EX2JLOPNUM	1C		2
EX2JLSTATUS	3		2
EX2JLSUSPD	2	80	3
EX2JLSYST	0		2
EX2JLTYPE	1		2
EX2JLUSER	C		2
EX2JOB	24		2
EX2JOBINFO	0		1
EX2JOBLOG	0		1
EX2JOBNUM	14		2
EX2NUMERR	2	40	3
EX2OCCTOKEN	4		3
EX2OPCID	4C		2
EX2OPNUM	1E		2
EX2SUBSYS	40		2
EX2SUBTOKEN	C		3
EX2SUSPD	2	80	3
EX2SYST	0		2
EX2TIM2	38		2
EX2TOKENS	4		2
EX2TYPE	1		2
EX2UNKNOWN	1D		2
EX2WSNAME	20		2
EX2XD	0		1
EX2XDALIAS	C		2
EX2XDDPSET	2	10	3
EX2XDFLAGS	2		2
EX2XDOPCID	4C		2
EX2XDPCP	2	40	3
EX2XDPLT	2	20	3
EX2XDSUBT	3		2
EX2XDSUSPD	2	80	3
EX2XDSYST	0		2
EX2XDTOKEN	4		2
EX2XDTYPE	1		2

## EMP - Event manager parameter area

### EMP - Event manager parameter area

Name : DCLEMP

Function:

This segment declares an Event Manager Parameter area. This control block is built, initialized, and freed by the Event Manager subtask and by callers of the event handler subroutine.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	320	EMP	EVENT MANAGER PARAMETERS
0	(0)	CHARACTER	4	EMPDESC	BLOCK DESCRIPTOR = EMP
4	(4)	CHARACTER	2	EMPVER	BLOCK MAPPING VERSION
6	(6)	BITSTRING	2	EMPFLAGS	EVENT MANAGER FLAGS
6	(6)	BITSTRING	1	EMPFLAG1	EVENT MANAGER FLAG1
				EMPJNTW	JNT WILL BE REPLACED
				EMPJNTC	JNT WILL BE RESET
				EMPLATE	NO MORE DELAY FOR CUR EVT
				EMPMANR	A MANUAL REQUEST
				EMPMCP	MCP BUILT THIS BLOCK
				EMPDELOP	CORRESP OPER DELETED
				EMPRSTRT	JOB HAS BEEN RESTRTED
				EMPB5SKP	B5 EVENT SKIPPED
7	(7)	BITSTRING	1	EMPFLAG2	EVENT MANAGER FLAG2
				EMPJRPFL	JNR=Y TRIGGER
				EMP3PREP	3P EVENT REPROCESSED
				EMPSRASC	SR AVAIL STATUS CHANGE
				EMPJRNFL	JNR=N TRIGGER
				EMPUSEV	USER EVENT FLAG
				EMPSRAVA	SR AVAIL IS YES
				EMPNOLOG	DON'T LOG
				EMP3P	3P EVENT
8	(8)	BITSTRING	4	EMPTMECB	TIMER ECB
12	(C)	ADDRESS	4	EMPMCAP	MCA ADDRESS
16	(10)	ADDRESS	4	EMPDTOP	1ST DELAYED EXIT RECORD
20	(14)	ADDRESS	4	EMPJNTP	JNT BUFFER ADDRESS
24	(18)	ADDRESS	4	EMPOPRP	CP OPER RECORD ADDRESS
28	(1C)	ADDRESS	4	EMPOCCP	CP OCC RECORD ADDRESS
32	(20)	ADDRESS	4	EMPWRKP	CP WORK RECORD ADDRESS
36	(24)	ADDRESS	4	EMPDOAP	CURRENT DOA PTR OR 0
40	(28)	ADDRESS	4	EMPNMMB	NORMAL MODE MGR PARAMS
44	(2C)	ADDRESS	4	EMPPERF	EV MGR PERFORMANCE
48	(30)	ADDRESS	4	EMPEDATA	ADDRESS OF EXT DATA
52	(34)	CHARACTER	4	EMPSTIM	TIMER ID
56	(38)	SIGNED	4	EMPDUR	EVENT DURATION (MINUTES)
60	(3C)	CHARACTER	8	EMPSTAMP	EVENT TIME STAMP
60	(3C)	SIGNED	4	EMPDATE	EVENT DATE (00YYDDDF)
64	(40)	SIGNED	4	EMPTIME	EVENT TIME (SECS*100)
68	(44)	SIGNED	4	EMPBSIZE	CURRENT PLAN BUFFER SIZE
72	(48)	SIGNED	4	EMPESIZE	EXT DATA SIZE
76	(4C)	ADDRESS	4	EMPDQEP	ADDRESS OF CURR DQE
80	(50)	ADDRESS	4	EMPEQEP	ADDRESS OF EQE
84	(54)	ADDRESS	4	EMPEXRP	PTR TO EXIT RECORD
88	(58)	CHARACTER	10	EMPCLOCK	EVENT TIME (YYMMDDHHMM)
88	(58)	CHARACTER	6	EMPYMMDD	EVENT DATE (YYMMDD)



## EMP - Event manager parameter area

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
94	(5E)	CHARACTER	4	EMPHHMM	EVENT TIME (HHMM)	
98	(62)	CHARACTER	4	EMPINDEX	OPERATION INDEX	
98	(62)	UNSIGNED	3	EMPOCCN	OCCURRENCE NUMBER	
101	(65)	UNSIGNED	1	EMPOPRN	OPERATION NUMBER	
102	(66)	SIGNED	2	EMPNETID	CURRENT NET NUMBER	
104	(68)	CHARACTER	8	EMPUSER	DIALOG USER NAME	
112	(70)	CHARACTER	1	EMPSIGN	RETURN CODE SIGN	
113	(71)	BITSTRING	1	EMPFLAG3	EVENT MANAGER FLAG3	
		1... ....		EMP23PSUS	A3P SUSPENDED FOR ETT	
		.1.. ....		EMPOPCSUB	SUBMITTED BY SCHEDULER	
		..1. ....		EMPZTWE	CALLING ZTWE FROM EM	
		...1 ....		EMPFLUSH0EVE	FLUSH '0' EVENTS	
		.... 1...		EMPTWSNO	NO RELEASE OCC IN TWS	
				RELEASEOCC		
		.... .1..		EMPJ4RECEIVED	IJ4 PROCESSING	
		.... ..1.		EMPDOAURG	ON=OLD DOA WAS URGENT	
		.... ...1		EMPEMUSR8	ON=EMUSR RC 8	
114	(72)	CHARACTER	4	EMPCODE	OPERATION ERROR CODE	
118	(76)	CHARACTER	1	EMPSTAT	NEW OPERATION STATUS	
119	(77)	CHARACTER	1	EMPCOM	JES COMMAND CHARACTER	
120	(78)	CHARACTER	8	EMPJOB	CURRENT JOB NAME	
128	(80)	CHARACTER	8	EMPJNUM	CURRENT JOB NUMBER	
136	(88)	CHARACTER	64	EMPEXIT	TIMER EXIT	
	200	(C8)	BITSTRING	1	EMPFLAG4	EVENT MANAGER FLAG4
					EMPNOETT	NO ADD A NEW ETT
					EMPWTO	
					EMPLOGGED	
					EMPSHADOWB	ON=READY BIND REQUESTED
					EMPPARALLELOPER	PARALLEL OPERATION
					EMPZCE2EJOB	
					*	
	201	(C9)	CHARACTER	1	*	FREE
	202	(CA)	CHARACTER	10	EMPDTTM	DATE AND TIME
	202	(CA)	CHARACTER	6	EMPD	DATE YYMMDD
	208	(D0)	SIGNED	4	EMPTM	TIME IN 100TH OF SECONDS
	212	(D4)	SIGNED	4	EMPCODEFIX	TWS NUMERIC ERROR CODE
	216	(D8)	CHARACTER	14	*	FREE
	222	(DE)	CHARACTER	8	EMPETTJOB	ETT JOB NAME
	230	(E6)	CHARACTER	1	EMPETTYP	ETT TYPE (J OR R)
	231	(E7)	CHARACTER	44	EMPETTCRIT	ETT CRITERIA
	275	(113)	CHARACTER	44	EMPETTEVNAM	COMPLETE ETT EVENT NAME
	319	(13F)	CHARACTER	1	EMPETTGDGL	LENGTH OF GDG DS ROOT
	320	(140)	CHARACTER	8	EMPSTRTIME	START TIME FOR WAIT
	328	(148)	ADDRESS	4	EMPMCPTRLP	POINTER TO CONDITION TRL CHAIN
	332	(14C)	ADDRESS	4	EMPCNDLP	POINTER TO CONDITION ID CHAIN
	336	(150)	ADDRESS	4	EMPCODPTR	MSG E031I
	340	(154)	ADDRESS	4	EMPEMTRLP	POINTER TO CONDITION TRL
	344	(158)	ADDRESS	4	EMPUSRFP	ADDRESS USER FIELD WORK AREA
	348	(15C)	ADDRESS	4	EMPX02P	ADDRESS WORK XD02
	352	(160)	CHARACTER		EMPEND	END OF EMP

## EMP - Event manager parameter area

### Cross reference

Name	Hex Offset	Hex Value	Level
EMP	0		1
EMPBSIZE	44		2
EMPB5SKP	6	01	4
EMPCLOCK	58		2
EMPCODE	72		2
EMPCODEFIX	D4		2
EMPCOM	77		2
EMPDATE	3C		3
EMPDELOP	6	04	4
EMPDESC	0		2
EMPDOAP	24		2
EMPDOURG	71	02	3
EMPDQEP	4C		2
EMPDT	CA		3
EMPDTOP	10		2
EMPDTTM	CA		2
EMPDUR	38		2
EMPEDATA	30		2
EMPEND	D8		2
EMPEQEP	50		2
EMPESIZE	48		2
EMPETTCRIT	E7		2
EMPETTEVNAM	113		2
EMPETTGDDL	13F		2
EMPETTJOB	DE		2
EMPETTYP	E6		2
EMPEXIT	88		2
EMPEXRP	54		2
EMPFLAGS	6		2
EMPFLAG1	6		3
EMPFLAG2	7		3
EMPFLAG3	71		2
EMPFLUSH0EVE	71	10	3
EMPHHMM	5E		3
EMPINDEX	62		2
EMPJNTC	6	40	4
EMPJNTP	14		2
EMPJNTW	6	80	4
EMPJNUM	80		2
EMPJOB	78		2
EMPJRNFL	7	10	4
EMPJRPFL	7	80	4
EMPJ4RECEIVED	71	04	3
EMPLATE	6	20	4
EMPMANR	6	10	4
EMPMCAPP	C		2
EMPMCP	6	08	4
EMPNETID	66		2
EMPNMMB	28		2

## EMP - Event manager parameter area

Name	Hex Offset	Hex Value	Level
EMPNOLOG	7	02	4
EMPOCCN	62		3
EMPOCCP	1C		2
EMPOPCSUB	71	40	3
EMPOPRN	65		3
EMPOPRP	18		2
EMPPARALLELOPER	C8	08	3
EMPPERF	2C		2
EMPRSTRT	6	02	4
EMPSHADOWB	C8	10	3
EMPSIGN	70		2
EMPSRASC	7	20	4
EMPSRAVA	7	04	4
EMPSTAMP	3C		2
EMPSTAT	76		2
EMPSTIM	34		2
EMPSTRTIME	140		2
EMPTIME	40		3
EMPTM	D0		3
EMPTMECB	8		2
EMPTWSNORELEASEOCC	71	08	3
EMPUSER	68		2
EMPUSEV	7	08	4
EMPUSRFP	158		2
EMPVER	4		2
EMPWRKP	20		2
EMPWTO	C8	40	3
EMPD02P	15C		2
EMPYMMDD	58		3
EMPZCE2EJOB	C8	04	3
EMPZTWE	71	20	3
EMP3P	7	01	4
EMP3PREP	7	40	4
EMP23PSUS	71	80	3

## EPR - Event data set positions

Name : DCLEPR

Function:

This segment declares the scheduler event data set position record. The third record on the first track of the checkpoint data set is always the EPR for the scheduler host system. The following records are EPR records for remote nodes. The order of the EPR records is the same as the order of the scheduler node names in the NNN record.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	152	EPR	THE SCHEDULER EVENT DS POSITIONS
0	(0)	CHARACTER	4	EPRDESC	BLOCK DESCRIPTOR = 'EPR '
4	(4)	CHARACTER	2	EPRVER	BLOCK MAPPING VERSION

## EPR - Event data set positions

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
6	(6)	BITSTRING	2	*	RESERVED
8	(8)	CHARACTER	8	EPRNODE	NODE NAME (HOST = 0)
16	(10)	SIGNED	4	* (2)	RESERVED (INIT TO ZERO)
24	(18)	CHARACTER	128	EPRTABLE	DATA SET POSITION TABLE
24	(18)	CHARACTER	8	EPRPOS (16)	MAX 16 EVENT DS PER NODE
24	(18)	SIGNED	4	EPRWCY#	WRITE CYCLE NUMBER
28	(1C)	SIGNED	4	EPRREC#	RECORD # OF LAST RECORD
152	(98)	CHARACTER		EPREND	END OF EPR

## Cross reference

Name	Hex Offset	Hex Value	Level
EPR	0		1
EPRDESC	0		2
EPREND	98		2
EPRNODE	8		2
EPRPOS	18		3
EPRREC#	1C		4
EPRTABLE	18		2
EPRVER	4		2
EPRWCY#	18		4

## EXO - ON/OFF line event

Name : DCLEXO

Function:

This segment declares a workstation availability event generated by WSSTAT, EQQUSINW, EQQUSIN, or from TCP/IP connected trackers.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXO	ON/OFF LINE EVENT
0	(0)	CHARACTER	1	EXOEVTYPE	EVENT TYPE = O
1	(1)	CHARACTER	1	*	RESERVED
2	(2)	CHARACTER	1	EXOSTYPE	EXO SUBTYPE 'F'=OFF,'N'=ON
3	(3)	CHARACTER	8	EXODEST	DESTINATION
11	(B)	CHARACTER	1	EXOTYPE	DESTINATION TYPE:  'X'=XCF 'D'=DASD 'H'=HOST 'S'=SNA
12	(C)	BITSTRING	4	EXOFLGS EXOSYSG EXOEDP EXOUX009	EXO FLAGS SYSTEM GONE FLAG REQUEST FOR EDP EVENT ISSUED DUE TO UX009 RC
12	(C)	BITSTRING	3	*	RESERVED
16	(10)	SIGNED	2	EXOGMTOF	GMT OFFSET IN MINUTES
18	(12)	SIGNED	2	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
20	(14)	CHARACTER	8	EXOCREAT	EVENT RECORD CREATION TIME WORD BNDRY
20	(14)	SIGNED	4	EXODATE	DATE FORMAT (00YYDDDDF)
24	(18)	SIGNED	4	EXOTIME	TIME FORMAT (SECS*100)
28	(1C)	CHARACTER	8	EXOEvet	EVENT CREATION TIME WORD BNDRY
28	(1C)	SIGNED	4	EXOEDATE	DATE FORMAT (00YYDDDDF)
32	(20)	SIGNED	4	EXOETIME	TIME FORMAT (SECS*100)
36	(24)	CHARACTER	4	EXOWSNAME	WORKSTATION NAME
40	(28)	CHARACTER	1	EXORERROUTE	REROUTE INDICATOR
41	(29)	CHARACTER	1	EXOSTARTOPR	STARTED OPERATIONS ACTION
42	(2A)	CHARACTER	4	EXOALTWS	ALTERNATE WS NAME
46	(2E)	CHARACTER	1	EXOAACT	ACTIONS ON ACTIVATE
47	(2F)	CHARACTER	29	*	RESERVED
76	(4C)	CHARACTER	4	EXOID	EVENT ID 'EQQX'

## Cross reference

Name	Hex Offset	Hex Value	Level
EXO	0		1
EXOAACT	2E		2
EXOALTWS	2A		2
EXOCREAT	14		2
EXODATE	14		3
EXODEST	3		2
EXOEDATE	1C		3
EXOEDP	C	40	3
EXOETIME	20		3
EXOEvet	1C		2
EXOEVTYP	0		2
EXOFLGS	C		2
EXOGMTOF	10		2
EXOID	4C		2
EXORERROUTE	28		2
EXOSTARTOPR	29		2
EXOSTYPE	2		2
EXOSYSG	C	80	3
EXOTIME	18		3
EXOTYPE	B		2
EXOUX009	C	20	3
EXOWSNAME	24		2

## EXP - Restart and clean up event

### EXP - Restart and clean up event

Name : DCLEXP

Function:

This segment declares the restart and clean up event.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXP	JOBLOG RETRIEVAL EVENT
0	(0)	CHARACTER	1	EXPEVTYP	EVENT TYPE = P
1	(1)	CHARACTER	1	EXPTYPE	TYPE OF INITIATED PROCESS: I=OPINFO RETRIEVAL INITIATED O=OPINFO RETRIEVAL STARTED 2=OPINFO RETRIEVAL ENDED C=CLEAN UP EVENT D=DELETE RESTART AND CLEANUP DSTORE OLD ENTRIES X=ASK OPINFO RETRY
2	(2)	CHARACTER	1	EXPSUBT	SUBTYPE: I=CLEAN UP INIT 0=CLEAN UP START 2=CLEAN UP END
3	(3)	CHARACTER	1	EXPCALLER	G=GS TASK W=WSA TASK E=EM TASK A=AR TASK F=FL TASK
4	(4)	CHARACTER	16	EXPADID	ADID
20	(14)	CHARACTER	8	EXPOCCTOK	OCCURRENCE TOKEN
28	(1C)	CHARACTER	8	EXPDEST	DESTINATION
36	(24)	CHARACTER	30	EXPTYPES	DECLARATION OF TYPES
66	(42)	UNSIGNED	2	EXPGMTOF	GMT OFFSET IN MINUTES
68	(44)	CHARACTER	8	EXPTIMES	REQUEST TIME STAMP AS PASSED FROM THE CONTROLLER
68	(44)	SIGNED	4	EXPTDATE	DATE FORMAT (00YYDDDF)
72	(48)	SIGNED	4	EXPTTIME	TIME FORMAT (SECS*100)
76	(4C)	CHARACTER	4	EXPID	EVENT IDENTIFICATION (EQQn)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPED	PD=DELETE RESTART AND CLEAN UP DSTORE OLD ENTRIES
36	(24)	CHARACTER	8	EXPDCP16	CP16 ID
44	(2C)	CHARACTER	22	*	FREE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPEX	PX=ASK OPINFO RETRY
36	(24)	CHARACTER	8	EXPXJNM	
44	(2C)	CHARACTER	8	EXPXJID	
52	(34)	SIGNED	4	EXPXRDRD	
56	(38)	SIGNED	4	EXPXRDRT	
60	(3C)	UNSIGNED	3	EXPXOCC	
63	(3F)	UNSIGNED	1	EXPROPR#	
64	(40)	CHARACTER	1	EXPFLAGS	
65	(41)	CHARACTER	1	EXPCP15	SET TO Y IF FROM DCPC2

## EXP - Restart and clean up event

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPEI	PI=OPINFO RETRIEVAL INITIATION
36	(24)	UNSIGNED	2	EXPIOPR#	OPERATION NUMBER
38	(26)	CHARACTER	8	EXPIUSER	TSO USERID
46	(2E)	CHARACTER	4	EXPIWS	WORKSTATION NAME
50	(32)	CHARACTER	8	EXPIJNM	JOBNAME
58	(3A)	CHARACTER	8	EXPIJID	JOB ID

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPECI	PC=OPINFO RETRIEVAL INIT CP15
36	(24)	UNSIGNED	2	EXPPCIOPR#	OPERATION NUMBER
38	(26)	CHARACTER	8	EXPCIUSER	TSO USERID
46	(2E)	CHARACTER	4	EXPCIWS	WORKSTATION NAME
50	(32)	CHARACTER	8	EXPCIJNM	JOBNAME
58	(3A)	CHARACTER	8	EXPCIJID	JOB ID

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	24	EXPTYPE0	P0=OPINFO RETRIEVAL STARTED
36	(24)	UNSIGNED	2	EXP0OPR#	OPERATION NUMBER
38	(26)	CHARACTER	8	EXP0JNM	JOBNAME
46	(2E)	CHARACTER	8	EXP0JID	JOB ID
54	(36)	CHARACTER	6	*	FREE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPE2	P2=OPINFO RETRIEVAL ENDED
36	(24)	UNSIGNED	2	EXP2OPR#	OPERATION NUMBER
38	(26)	CHARACTER	1	EXP2STAT	FINAL RESULT OF JOBLOG RETRIEVAL: C=COMPLETED NORMALLY E=PROCESSING ENDED IN ERROR
39	(27)	CHARACTER	1	EXP2XST	BLANK=DEFAULT VALUE
40	(28)	CHARACTER	8	EXP2USER	USERID TO BE NOTIFIED
48	(30)	CHARACTER	8	EXP2JNM	JOBNAME
56	(38)		8	EXP2JID	JOB ID
64	(40)	CHARACTER	1	EXP2FLAGS	FLAGS FROM ARC DQE
				EXP2FROMAR	OPI FROM AR TASK
				*	
65	(41)	CHARACTER	1	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPREQ	PLR/PCR=INIT APPLY LOGIC/CLEAN UP
36	(24)	UNSIGNED	2	EXPROPR#	OPERATION NUMBER
38	(26)	CHARACTER	8	EXPRJNM	JOBNAME
46	(2E)	CHARACTER	8	EXPRJID	JOB ID (ONLY NUMERIC PART)
54	(36)	CHARACTER	1	*	FREE

## EXP - Restart and clean up event

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
55	(37)	CHARACTER	1	EXPRDIA	CLEAN UP FROM DIALOG: Y=CLEAN UP IS PRESENT N=CLEAN UP NOT PRESENT BLANK=NOT FROM DIALOG
56	(38)	BITSTRING	1	EXPRFLAG EXPREXP JCLUSED *	EXPANDED JCL REALLY USED EXPANDED JCL USED FREE
57	(39)	CHARACTER	1	*	RESERVED
58	(3A)	CHARACTER	8	EXPRUSER	TSO USER

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPCNF	PLR/PCR=INIT APPLY LOGIC/CLEAN UP ENDED
36	(24)	UNSIGNED	2	EXPCOPR#	OPERATION NUMBER
38	(26)	CHARACTER	4	EXPCGSTOK	GS REQUEST TOKEN
42	(2A)	CHARACTER	8	EXPCJNM	JOBNAME
50	(32)	CHARACTER	8	EXPCJID	JOB ID
58	(3A)	CHARACTER	1	EXPCSTAT	C=COMPLETED E=ERROR
59	(3B)	CHARACTER	1	EXPCXST	EXTENDED STATUS
60	(3C)	ADDRESS	4	EXPCJCL	POINTER TO JCL FOR DOA
64	(40)	BITSTRING	1	EXPCFLAG EXPCEXPJCLUSED *	EXPANDED JCL REALLY USED FREE
65	(41)	CHARACTER	1	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	STRUCTURE	30	EXPTYPC2	PC2=MERGE FOR CLEAN UP OPERATION
36	(24)	UNSIGNED	2	EXPC2OPR#	OPERATION NUMBER
38	(26)	CHARACTER	4	EXPC2GSTOK	GS REQUEST TOKEN
42	(2A)	CHARACTER	8	EXPC2JNM	JOBNAME
50	(32)	CHARACTER	8	EXPC2JID	JOB ID
58	(3A)	CHARACTER	1	EXPC2OSTA	JOBLOG RETRIEVAL STATUS: C=COMPLETED E=ERROR
59	(3B)	CHARACTER	1	EXPC2STAT	CLEAN UP STATUS: C=COMPLETED E=ERROR
60	(3C)	CHARACTER	1	EXPC2XST	EXTENDED STATUS
61	(3D)	CHARACTER	1	EXPC2FLAGS	FLAGS FROM ARC DQE
62	(3E)	CHARACTER	4	*	RESERVED



## Cross reference

Name	Hex Offset	Hex Value	Level
EXP	0		1
EXPADID	4		2
EXPCALLER	3		2
EXPCEXPJCLOSED	40	80	3
EXPCGSTOK	26		2
EXPCIJID	3A		2
EXPCIJNM	32		2
EXPCIOPR#	24		2
EXPCIUSER	26		2
EXPCIWS	2E		2
EXPCJCL	3C		2
EXPCJID	32		2
EXPCJNM	2A		2
EXPCOPR#	24		2
EXPCSTAT	3A		2
EXPCXST	3B		2
EXPC2FLAGS	3D		2
EXPC2GSTOK	26		2
EXPC2JID	32		2
EXPC2JNM	2A		2
EXPC2OPR#	24		2
EXPC2OSTA	3A		2
EXPC2STAT	3B		2
EXPC2XST	3C		2
EXPDCP16	24		2
EXPDEST	1C		2
EXPEVTYP	0		2
EXPGMTOF	42		2
EXPID	4C		2
EXPIJID	3A		2
EXPIJNM	32		2
EXPIOPR#	24		2
EXPIUSER	26		2
EXPIWS	2E		2
EXPOCCTOK	14		2
EXPRDIA	37		2
EXPREXPJCLOSED	38	80	3
EXPRFLAG	38		2
EXPRJID	2E		2
EXPRJNM	26		2
EXPROPR#	24		2
EXPRUSER	3A		2
EXPSUBT	2		2
EXPTDATE	44		3
EXPTIMES	44		2
EXPTTIME	48		3
EXPTYPCNF	24		1
EXPTYPC2	24		1
EXPTYPE	1		2

## EXP - Restart and clean up event

Name	Hex Offset	Hex Value	Level
EXPTYPECI	24		1
EXPTYPED	24		1
EXPTYPEI	24		1
EXPTYPES	24		2
EXPTYPEX	24		1
EXPTYPE0	24		1
EXPTYPE2	24		1
EXPTYPREQ	24		1
EXPXCP15	41		2
EXPXFLAGS	40		2
EXPXJID	2C		2
EXPXJNM	24		2
EXPXOCC	3C		2
EXPXOPR#	3F		2
EXPXRDRD	34		2
EXPXRDRT	38		2
EXP0JID	2E		2
EXP0JNM	26		2
EXP0OPR#	24		2
EXP2FLAGS	40		2
EXP2FROMAR	40	80	3
EXP2JID	38		2
EXP2JNM	30		2
EXP2OPR#	24		2
EXP2STAT	26		2
EXP2USER	28		2
EXP2XST	27		2

## EXR - Exit record

Name : DCLEXR

Function:

This segment declares an exit record. Exit records are built by SMF and JES exits, passed to the event writer via CSA buffers, and are written to an event data set as part of an event record by the event writer.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXR	EXIT RECORD
0	(0)	CHARACTER	2	EXRTYPE	RECORD TYPE
0	(0)	CHARACTER	1	EXRSYST	SYSTEM TYPE A B
1	(1)	CHARACTER	1	EXREVTYP	EVENT TYPE 1 2 3 4 5 6
2	(2)	CHARACTER	1	EXRSTYPE	EVENT SUBTYPE (ONLY TYPE3)
3	(3)	BITSTRING	1	EXRFLAGS	EXIT FLAGS
				EXRRETRY	RETRY RELEASE COMMAND
				EXROPCHO	THIS JOB IS IN HOLD
				EXROHELD	JOB WAS HELD BY THE SCHEDULER
				EXRJKILL	JOB KILLED BY JES IN RDR
				EXRJCCEC	ERROR CODE FROM JCC

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				EXRJCCCH	CHECKED BY JCC
				EXRJCCER	ERROR IN JCC
				EXRRLAST	RETCODE(LAST) ACTIVE
4	(4)	BITSTRING	1	EXRTERMF	TERMINATION FLAGS
				EXRJCSET	EXRJCOUT IS VALID
				EXRJCOUT	JOB HAS JCC SYSOUT
				EXRDISCR	DISCREPANCY MSG
				EXRMCHLD	1= MSGCLASS IS HELD
				EXRCMREQ	1= REQUEUE MSG CLASS
				*	
				EXRJBTAB	0=NORMAL, 1=ABEND (JOB)
				EXRABEND	0=NORMAL, 1=ABEND (STEP)
				EXRFLUSH	0=NORMAL, 1=FLUSHED STEP
5	(5)	BITSTRING	1	EXRERROR	JOB ERROR SWITCH LCTERROR
				EXRFAIL	JOB FAILED
				EXRJQA	ON= IS A JQA
				EXRZ2LEVEL	
				EXRR4LEVEL	
				*	ALLOC BUT NOT UNALLOC DONE
				EXRCFAL	JOB FAILED ON COND CODES
				EXRJCJOB	JCJOB PROCESSED OK
				*	FREE
6	(6)	SIGNED	2	EXRGMTOF	GMT OFFSET IN MINUTES
8	(8)	CHARACTER	8	EXRJOBNAME	JOB NAME
16	(10)	CHARACTER	8	EXRJOBID	JOB NUMBER
24	(18)	CHARACTER	8	EXRCREAT	EVENT CREATION TIME
24	(18)	SIGNED	4	EXRDATE	DATE FORMAT (00YYDDDF)
28	(1C)	SIGNED	4	EXRTIME	TIME FORMAT (SECS*100)
32	(20)	CHARACTER	8	EXRJSRDR	JES READER DATE & TIME
32	(20)	SIGNED	4	EXRRDATE	DATE FORMAT (00YYDDDF)
36	(24)	SIGNED	4	EXRRTIME	TIME FORMAT (SECS*100)
40	(28)	SIGNED	4	EXRSDATE	OPERATION START DATE
44	(2C)	SIGNED	4	EXRSTIME	OPERATION START TIME
48	(30)	SIGNED	4	EXREDATE	OPERATION END DATE
52	(34)	SIGNED	4	EXRETIME	OPERATION END TIME
52	(34)	SIGNED	4	EXRORGID	NJE ORIGIN JOB NUMBER
56	(38)	CHARACTER	8	EXRSTEPN	JOB STEP NAME
56	(38)	CHARACTER	8	EXRONJE	NAME OF ORIG NJE NOD
56	(38)	CHARACTER	1	EXRCLASS	PRINTOUT CLASS
57	(39)	CHARACTER	1	*	RESERVED
58	(3A)	SIGNED	2	EXRASID	JOB ASID
60	(3C)	SIGNED	4	EXREXEID	NJE EXECUTION JOBN
64	(40)	CHARACTER	8	EXRPSTEP	PROCEDURE STEP NAME
64	(40)	CHARACTER	8	EXRNNJE	THIS/NEXT NJE NODE
64	(40)	CHARACTER	8	EXRFORM	FORM NUMBER
72	(48)	SIGNED	2	EXRCODE	COMPLETION/CONDITION CODE
74	(4A)	CHARACTER	1	EXRINDIC	STATUS INDICATORS
				EXRJESV4	JES SP4 OR ABOVE1/3P/
				EXRSPUN	SPUN OFF DS RCD
				EXRTERM	OPER TERMINATED DATAGROUP
				EXRINTER	OPER INTERRUPTED --
				EXRRSTRT	OPER RESTARTED --
				EXRNDEST	NOT FINAL F/\$SYSMSGSGS 3P

## EXR - Exit record

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				EXRNODS4	NO \$SYSMSGs FOUND 3P
				EXRSUSPD	SUSPENDED
75	(4B)	UNSIGNED	1	EXRSTPNR	STEP NUMBER
75	(4B)	BITSTRING	1	EXRPURGE	JOB PURGE BITS
				*	NOT USED
				EXRSTALL	STEPEVENTS(ALL)
				EXRSTNZ	STEPEVENTS(NO) FLAG
				EXROPKAN	CANCELLED BY OPER
76	(4C)	CHARACTER	4	EXROPCID	SCHEDULER IDENTIFIER

## Cross reference

Name	Hex Offset	Hex Value	Level
EXR	0		1
EXRABEND	4	02	4
EXRASID	3A		4
EXRCFAL	5	04	3
EXRCLASS	38		4
EXRCMREQ	4	08	3
EXRCODE	48		2
EXRCREAT	18		2
EXRDATE	18		3
EXRDISCR	4	20	3
EXREDATE	30		2
EXRERROR	5		2
EXRETIME	34		2
EXREVTYP	1		3
EXREXEID	3C		4
EXRFAIL	5	80	3
EXRFLAGS	3		2
EXRFLUSH	4	01	3
EXRFORM	40		4
EXRGMTOF	6		2
EXRINDIC	4A		2
EXRINTER	4A	10	3
EXRJBTAB	4	02	3
EXRJCCCH	3	04	3
EXRJCEC	3	08	3
EXRJCCER	3	02	3
EXRJCJOB	5	02	3
EXRJCOUT	4	40	3
EXRJCSET	4	80	3
EXRJESV4	4A	80	3
EXRJKILL	3	10	3
EXRJOBID	10		2
EXRJOBN	8		2
EXRJQA	5	40	3
EXRJSRDR	20		2
EXRMCHLD	4	10	3
EXRNDEST	4A	04	3

Name	Hex Offset	Hex Value	Level
EXRNNJE	40		3
EXRNODS4	4A	02	3
EXROHELD	3	20	3
EXRONJE	38		3
EXROPCAN	4B	01	4
EXROPCHO	3	40	3
EXROPCID	4C		2
EXRORGID	34		3
EXRPSTEP	40		2
EXRPURGE	4B		3
EXRRDATE	20		3
EXRRETRY	3	80	3
EXRRLAST	3	01	3
EXRRSTRT	4A	08	3
EXRRTIME	24		3
EXRR4LEVEL	5	10	3
EXRSDATE	28		2
EXRSPUN	4A	40	3
EXRSTALL	4B	04	4
EXRSTEPN	38		2
EXRSTIME	2C		2
EXRSTNZ	4B	02	4
EXRSTPNR	4B		2
EXRSTYPE	2		2
EXRSUSPD	4A	01	3
EXRSYST	0		3
EXRTERM	4A	20	3
EXRTERMF	4		2
EXRTIME	1C		3
EXRTYPE	0		2
EXRZ2LEVEL	5	20	3

---

## EXS - Resource event

Name : DCLEXS

Function:

This segment declares a special resource change event record. These event records are built by the EQQEVPGM and EQQEVCMMD programs, are passed to the event writer via csa buffers, and are written to an event data set as part of an event record by the event writer. These events can also be generated from a call to EQQUSIN, ESSUSINS, or from the API.

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
0	(0)	STRUCTURE	80	EXS	SPECIAL RESOURCE EVENT
0	(0)	CHARACTER	1	EXSTYPE	'S' FOR SPECIAL RESOURCE EVENT

## EXS - Resource event

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
1	(1)	CHARACTER	1	EXSAVAIL	GLOBAL AVAILABILITY SETTING  Y=AVAILABLE, N=NOT AVAILABLE R=RESET <BLANK>='KEEP
2	(2)	CHARACTER	1	EXSCREATE	CREATE IF NEW, Y N
3	(3)	CHARACTER	1	EXSSUBTYPE	NOT USED
4	(4)	UNSIGNED	1	EXSGDGL	LENGTH OF GDG DS ROOT
5	(5)	CHARACTER	1	EXSR3DEF	DEFAULT SET IN R3
6	(6)	SIGNED	2	EXSGMTOF	GMT OFFSET (MINUTES)
8	(8)	SIGNED	4	EXSCDAT	CREATION DATE (00YYDDDF)
12	(C)	SIGNED	4	EXSCTIM	CREATION TIME (SEC*100)
16	(10)	SIGNED	4	EXSEDAT	EVENT DATE (00YYDDDF)
20	(14)	SIGNED	4	EXSETIM	EVENT TIME (SEC*100)
24	(18)	CHARACTER	8	EXSUSER	NAME OF UPDATING USER
32	(20)	CHARACTER	44	EXSNAME	RESOURCE NAME
76	(4C)	CHARACTER	4	EXSOPCID	EVENT ID 'EQQX'

## Cross reference

Name	Hex Offset	Hex Value	Level
EXS	0		1
EXSAVAIL	1		2
EXSCDAT	8		2
EXSCREATE	2		2
EXSCTIM	C		2
EXSEDAT	10		2
EXSETIM	14		2
EXSGDGL	4		2
EXSGMTOF	6		2
EXSNAME	20		2
EXSOPCID	4C		2
EXSR3DEF	5		2
EXSSUBTYPE	3		2
EXSTYPE	0		2
EXSUSER	18		2

## EXSA - Resource event extension

Name : DCLEXSA

Function:

Defines additional data for a resource event (s).

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	88	EXSA	RES EVENT ADDENDUM
0	(0)	CHARACTER	4	EXSA_ID	DESCRIPTOR - EXSA
4	(4)	CHARACTER	2	EXSA_VER	BLOCK MAPPING VERSION

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
6	(6)	CHARACTER	44	EXSANAME	RESOURCE NAME	
50	(32)	CHARACTER	4	EXSAOPCID	OPCID	
54	(36)	BITSTRING	1	EXSAFLG1	FLAG BYTE 1	
				EXSARODM	RODM EVENT	
				EXSADEVS	DEVIATION SET	
				EXSAQUAS	QUANTITY SET	
				EXSADEVR	DEVIATION RESET	
				EXSAQUAR	QUANTITY RESET	
				EXSARODMLOST	RODM LOST	
				EXSALIFESPANB	LIFESPAN SPECIFIED	
				*	RESERVED	
55	(37)	CHARACTER	1	EXSATYPE	UPDATE TYPE. A, Q OR D UPD TYPE REQD FOR RODM EV	
56	(38)	SIGNED	4	EXSAQUANT	QUANTITY	
60	(3C)	SIGNED	4	EXSADEV	DEVIATION	
64	(40)	SIGNED	4	*(2)	RESERVED	
72	(48)	CHARACTER	1	EXSASUBE		
73	(49)	CHARACTER	1	EXSALIFESPAN	Y=YES N=NO R=RESET	
76	(4C)	SIGNED	4	EXSALIFETIME	MINUTES	
80	(50)	CHARACTER	8	EXSAJOB	JOB NAME FROM DS TRIGGER	
88	(58)	CHARACTER	2	*	RESERVED	

## Cross reference

Name	Hex Offset	Hex Value	Level
EXSA	0		1
EXSA_ID	0		2
EXSA_VER	4		2
EXSADEV	3C		2
EXSADEVR	36	10	3
EXSADEVS	36	40	3
EXSAFLG1	36		2
EXSAJOB	50		2
EXSALIFESPAN	49		2
EXSALIFESPANB	36	02	3
EXSALIFETIME	4C		2
EXSANAME	6		2
EXSAOPCID	32		2
EXSAQUANT	38		2
EXSAQUAR	36	08	3
EXSAQUAS	36	20	3
EXSARODM	36	80	3
EXSARODMLOST	36	04	3
EXSASUBE	48		2
EXSATYPE	37		2

## EXT - Ready to receive event

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### EXT - Ready to receive event

Name : DCLEXT

Function:

This segment declares a SET TIME (GMTOFFSET) event record. These event records are built by the EQQEVPGM and EQQEVCMDCMD programs, passed to the Event Writer through CSA buffers, and written to an event data set as part of an event record by the Event Writer.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXT	READY TO RECEIVE EVENT
0	(0)	CHARACTER	1	EXTETYPE	EVENT TYPE = T
1	(1)	CHARACTER	3	*	RESERVED
4	(4)	CHARACTER	4	EXTSID	SYSTEM IDENTIFICATION
8	(8)	SIGNED	4	EXTGMTOF	GMT OFFSET IN MINUTES
12	(C)	SIGNED	4	EXTCDAT	CREATION DATE FORMAT (00YYDDDF)
16	(10)	SIGNED	4	EXTCTIM	CREATION TIME FORMAT (SEC*100)
20	(14)	SIGNED	4	EXTEDAT	EVENT DATE FORMAT (00YYDDDF)
24	(18)	SIGNED	4	EXTETIM	EVENT TIME FORMAT (SEC*100)
28	(1C)	SIGNED	4	EXTGMTSEC	GMT OFFSET
32	(20)	CHARACTER	4	EXTENF	T TYPE ENF
36	(24)	UNSIGNED	1	EXTENFB1	ENF 53 BYTE 1
37	(25)	UNSIGNED	1	EXTENFB2	ENF 53 BYTE 2
38	(26)	UNSIGNED	1	EXTENFB3	ENF 53 BYTE 3
39	(27)	CHARACTER	1	EXTRCHA	REAL CHANGE Y/M
40	(28)	CHARACTER	48	*	RESERVED
76	(4C)	CHARACTER	4	EXTOPCID	EVENT ID 'EQQX'

### Cross reference

Name	Hex Offset	Hex Value	Level
EXT	0		1
EXTCDAT	C		2
EXTCTIM	10		2
EXTEDAT	14		2
EXTETIM	18		2
EXTGMTOF	8		2
EXTGMTSEC	1C		2
EXTOPCID	4C		2
EXTSID	4		2
EXTTYPE	0		2

---

### EXU - User event record

Name : DCLEXU

Function:

This segment declares a user exit event record. User event records are built by OPSTAT, EQQUSIN, EQQUSINT, or the API and passed to the event writer via CSA buffers, and are written to an event data set as part of an event record by the event writer.



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXU	USER EVENT RECORD
0	(0)	CHARACTER	1	EXUSYST	'G' FOR GENERAL WS EVENT
1	(1)	CHARACTER	1	EXUTYPE	'S'=START;'C'=COMPLETE OR 'E'=ENDED IN ERROR
2	(2)	CHARACTER	1	EXUCLASS	SYSOUT CLASS
3	(3)	CHARACTER	1	*	RESERVED
4	(4)	CHARACTER	8	EXUJOBN	JOB NAME
12	(C)	CHARACTER	16	EXUAPPL	APPLICATION NAME
28	(1C)	CHARACTER	4	EXUWSN	WORK STATION NAME
32	(20)	SIGNED	4	EXUCDAT	CREATION DATE (00YYDDDF)
36	(24)	SIGNED	4	EXUCTIM	CREATION TIME (SEC*100)
40	(28)	SIGNED	4	EXUEDAT	EVENT DATE (00YYDDDF)
44	(2C)	SIGNED	4	EXUETIM	EVENT TIME (SEC*100)
44	(2C)	SIGNED	2	EXUGMTOA	GMT OFFSET FOR APP
46	(2E)	SIGNED	2	*	RESERVED
48	(30)	SIGNED	2	EXUOPNO	OPERATION NUMBER
50	(32)	CHARACTER	10	EXUINP	APPL INP ARR (YYMMDDHHMM)
60	(3C)	SIGNED	2	EXUDUR	DURATION (MINUTES)
62	(3E)	SIGNED	2	EXUGMTOF	GMT OFFSET (MINUTES) ONLY USED IF EXUTYPE = 'C'
64	(40)	CHARACTER	4	EXUERR	ERROR CODE. ONLY USED IF EXUTYPE = 'E'
68	(44)	CHARACTER	8	EXUFORM	FORM NUMBER
76	(4C)	CHARACTER	4	EXUOPCID	EVENT ID 'EQQX'

## Cross reference

Name	Hex Offset	Hex Value	Level
EXU	0		1
EXUAPPL	C		2
EXUCDAT	20		2
EXUCLASS	2		2
EXUCTIM	24		2
EXUDUR	3C		2
EXUEDAT	28		2
EXUERR	40		2
EXUETIM	2C		2
EXUFORM	44		2
EXUGMTOA	2C		3
EXUGMTOF	3E		2
EXUINP	32		2
EXUJOBN	4		2
EXUOPCID	4C		2
EXUOPNO	30		2
EXUSYST	0		2
EXUTYPE	1		2
EXUWSN	1C		2

---

**EXUA - User event addendum**

Name : DCLEXUA

Function:

This segment declares a user event addendum record.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	72	EXUA	USER EVENT ADDENDUM
0	(0)	CHARACTER	4	EXUA_ID	DESCRIPTOR - EXUA
4	(4)	CHARACTER	2	EXUA_VER	BLOCK MAPPING VERSION
6	(6)	CHARACTER	10	EXUAINP	IA (YYMMDDHHMM)
16	(10)	SIGNED	2	EXUADUR	DURATION (MINUTES)
18	(12)	SIGNED	2	EXUAGMTOF	GMT OFFSET (MINUTES)
20	(14)	CHARACTER	4	EXUAERR	ERROR CODE
24	(18)	CHARACTER	8	EXUAFORM	FORM NUMBER
32	(20)	CHARACTER	4	EXUAOPCID	SCHEDULER ID
36	(24)	CHARACTER	16	EXUUDATA	USERDATA
52	(34)	CHARACTER	1	EXUAOPIN	OPINFO COMMAND Y/N
53	(35)	CHARACTER	3	*	RESERVED
56	(38)	CHARACTER	8	EXUATOKEN_FULL	OPERATION FULL TOKEN
56	(38)	CHARACTER	4	EXUATOKEN_PRE	PREFIX
60	(3C)	UNSIGNED	4	EXUATOKEN	SCHEDULER TOKEN
64	(40)	CHARACTER	6	EXUAJOBNBR	JOB NUMBER
70	(46)	CHARACTER	2	*	RESERVED

**Cross reference**

Name	Hex Offset	Hex Value	Level
EXUA	0		1
EXUA_ID	0		2
EXUA_VER	4		2
EXUADUR	10		2
EXUAERR	14		2
EXUAFORM	18		2
EXUAGMTOF	12		2
EXUAINP	6		2
EXUAJOBNBR	40		2
EXUAOPCID	20		2
EXUAOPIN	34		2
EXUATOKEN	3C		3
EXUATOKEN_FULL	38		2
EXUATOKEN_PRE	38		3
EXUUDATA	24		2

## EXV - Scheduling environment event

Name : DCLEXV

### Function:

This segment declares a scheduling environment availability event.

It can be:

VS (single SE name available)

VM (multiple SE name available)

A buffer is associated with this event containing a list of SE names

VL (log event generated by the controller to track CP changes to VS/VM events)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXV	SCHEDULING ENVIRONMENT EVENT
0	(0)	CHARACTER	1	EXVTYP	EVENT TYPE=V
1	(1)	CHARACTER	1	EXVTTYPE	SUBTYPE: S=SINGLE SCHEDULING EVENT M=MULTIPLE SCHEDULING EVENT
2	(2)	CHARACTER	2	*	
4	(4)	BITSTRING	4	EXVQUAL	ENF EVENT QUALIFIER
8	(8)	CHARACTER	4	EXVTRA	ENFREQ MACRO TRACKER NAME PARAMETER
12	(C)	UNSIGNED	4	EXVEVCODE	EVENT CODE (57 or 41)
16	(10)	CHARACTER	14	*	
30	(1E)	UNSIGNED	2	EXVFLAGS	FLAGS
30	(1E)	BITSTRING	1	EXVFLAGS EXVSUTOP	ON=EVENT GENERATED BY SUBMIT TASK
				*	
32	(20)	CHARACTER	30	*	
62	(3E)	SIGNED	2	EXVGMTOFF	GMT OFFSET IN MINUTES
64	(40)	CHARACTER	8	EXVTIMES	REQUEST TIME STAMP
64	(40)	SIGNED	4	EXVTDATE	DATE FORMAT (00YYDDDF)
68	(44)	SIGNED	4	EXVTTIME	TIME FORMAT (SECS*100)
72	(48)	CHARACTER	4	EXVSSNM	ECHO SUBSYSTEM NAME
76	(4C)	CHARACTER	4	EXVID	EVENT IDENTIFICATION 'EQQF'

## Cross reference

Name	Hex Offset	Hex Value	Level
EXV	0		1
EXVDATA	20		2
EXVEVCODE	C		1
EXVEVTYP	0		2
EXVFLAGS	1E		2
EXVGMTOFF	3E		2
EXVID	4C		2
EXVLEVM	2C	20	3
EXVLEVS	2C	40	3
EXVFLAG	2C		2

## EXV - Scheduling environment event

Name	Hex Offset	Hex Value	Level
EXVLOCCTOK	24		2
EXVLOPNUM	22		2
EXVPLXID	20		2
EXVLSCHE	2E		2
EXVLXSTAT	2C	80	3
EXVMNUM	24		2
EXVMPLXID	20		2
EXVQUAL	4		2
EXVSPLXID	20		3
EXVSSCHE	24		3
EXVSSNM	48		2
EXVSSYSNM	34		2
EXVSUTOP	1E	80	3
EXVTDAT	40		2
EXVTIMES	40		1
EXVTRA	8		1
EXVTTIME	44		1
EXVTYPE	1		2
EXVTYPEL	20		2
EXVTYPEM	20		3
EXVTYPES	20		3

## EXW - Workstation status event

Name : DCLEXW

Function:

This segment declares a workstation status event record. These event records are built via the WSSTAT, EQQUSIN, EQQUSINW, of the API. They are passed to the event writer via CSA buffers, and written to an event data set as part of an event record by the event writer.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXW	WORKSTATION STATUS EVENT
0	(0)	CHARACTER	1	EXWTYPE	'W' FOR WSSTAT EVENT
1	(1)	CHARACTER	8	EXWUSER	NAME OF UPDATING USER
9	(9)	CHARACTER	8	EXWDEST	DESTINATION
17	(11)	CHARACTER	4	EXWWSN	WORKSTATION NAME
21	(15)	BITSTRING	1	EXWFLAGS	FLAGS
				EXWTRK	TRK GENERATED EVENT
				*	RESERVED
22	(16)	CHARACTER	1	EXWSTAT	NEW STATUS
23	(17)	CHARACTER	1	EXWREROUT	REROUTE INDICATOR
24	(18)	CHARACTER	1	EXWSTOP	STARTED OPERATION INDICATOR
25	(19)	CHARACTER	4	EXWALTWS	ALTERNATE WORKSTATION NAME
29	(1D)	CHARACTER	3	*	RESERVED
32	(20)	SIGNED	4	EXWCDAT	CREATION DATE (00YYDDDF)
36	(24)	SIGNED	4	EXWCTIM	CREATION TIME (SEC-100)
40	(28)		1	EXWCMD	CMD L/U/S/P
41	(29)	CHARACTER	16	EXWMGR	DOMAIN MANAGER
57	(39)	CHARACTER	19	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
76	(4C)	CHARACTER	4	EXWOPCID	EVENT ID 'EQQX'

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EXX	TRACKER EVENT RECORD
0	(0)	CHARACTER	1	EXXSYST	'X' TYPE EVENT
1	(1)	CHARACTER	1	EXXTYPE	INDICATOR
2	(2)	CHARACTER	1	EXXSYSID	INDICATOR
3	(3)	BITSTRING	1	EXXFLAG	FLAGS
				EXXERRCC	ERRC IN CHAR
				*	RESERVED
4	(4)	CHARACTER	4	*	RESERVED
8	(8)	CHARACTER	8	EXXJOB	JOB NAME
16	(10)	CHARACTER	5	EXXJNUM	JOB NUMBER
21	(15)	CHARACTER	3	*	RESERVED
24	(18)	SIGNED	4	EXXCDAT	CREATION DATE (00YYDDDF)
28	(1C)	SIGNED	4	EXXCTIM	CREATION TIME (SEC*100)
32	(20)	SIGNED	2	EXXGMTOF	GMT OFFSET (MINUTES)
34	(22)	CHARACTER	2	*	RESERVED
36	(24)	SIGNED	4	EXXERR	ERROR CODE BIN FORM
40	(28)	CHARACTER	4	EXXERRC	ERROR CODE CHAR FORM
44	(2C)	CHARACTER	8	EXXTOKEN_FULL	OPERATION FULL TOKEN
44	(2C)	CHARACTER	4	EXXTOKEN_PRE	PREFIX
48	(30)	UNSIGNED	4	EXXTOKEN	OPCTOKEN
52	(34)	CHARACTER	7	EXXAS4ERRC	FULL AS400 ERROR CODE
59	(3B)	CHARACTER	17	*	RESERVED
76	(4C)	CHARACTER	4	EXXOPCID	EVENT ID 'EQQX'

## Cross reference

Name	Hex Offset	Hex Value	Level
EXW	0		1
EXWALTWS	19		2
EXWCDAT	20		2
EXWCMD	20		2
EXWCTIM	24		2
EXWDEST	9		2
EXWFLAGS	15		2
EXWMGR	29		2
EXWOPCID	4C		2
EXWREROUT	17		2
EXWSTAT	16		2
EXWSTOP	18		2
EXWTRK	15	80	3
EXWTYPE	0		2
EXWUSER	1		2
EXWWSN	11		2

Name	Hex Offset	Hex Value	Level
EXX	0		1
EXXAS4ERRC	34		2

## EXW - Workstation status event

Name	Hex Offset	Hex Value	Level
EXXCDAT	18		2
EXXCTIM	1C		2
EXXERR	24		2
EXXERRC	28		2
EXXERRCC	3	80	3
EXXFLAG	3		2
EXXGMTOF	20		2
EXXJNUM	10		2
EXXJOBN	8		2
EXXOPCID	4C		2
EXXSYSID	2		2
EXXSYST	0		2
EXXTOKEN	30		3
EXXTOKEN_FULL	2C		2
EXXTOKEN_PRE	2C		3
EXXTYPE	1		2

## EX0 - Tivoli Workload Scheduler event data

Name : DCLEX0

Function:

This segment declares an event record from Tivoli Workload Scheduler.

This layout maps the records of the EQQTWSOU and EQQTWSIN files.

From the second to the last record, the structures used to map from the 25th byte onwards are:

- EX0EVENT for EQQTWSIN
- EX0TWS for EQQTWSOU

The following table shows the events and data areas used to map these events.

EVENT	DESCRIPTION	MAPPING WITH EX0 DATA AREA
HEAD	HEADER	NOT APPLICABLE
BLK	BLOCK START	EX0TWSBODY
BLKE	BLOCK END	EX0TWSBODY
WSCG	CHANGE THE WORKSTATION STATUS	EX0BODY / EX0TWSBODY
JOBC	CHANGE THE JOB	EX0BODY / EX0TWSBODY
JOBA	ADD JOB	EX0TWSBODY
JOBR	ADD RECOVERY JOB	EX0TWSBODY
OCCC	CHANGE OCCURRENCE	EX0TWSBODY
OCCA	ADD OCCURRENCE	EX0TWSBODY
LOG	GET JOBLOG	EX0BODY / EX0TWSBODY
DEP	CHANGE A DEPENDENCY	EX0TWSBODY
SRDP	SPECIAL RESOURCE DEPENDENCY	EX0TWSBODY
JCL	SEND JCL	EX0TWSBODY
PRMR	PROMPT REPLY	EX0BODY
DOMC	CHANGE DOMAIN FOR FTW	EX0TWSBODY
SYNC	SYNCHRONIZATION EVENT	EX0BODY/EX0TWSBODY
JSUB	JOB SUBMISSION	EX0TWSBODY
SETT	SET TIME EVENT	EX0TWSBODY

For example, if you want to determine the workstation event status in the EQQTWSIN data set:

- Check the first 4 bytes of the record (EVERECTYPE of DCLEVE). The correct value must be 'WSCG'.
- Use the EX0EVENT structure from the 25th byte of the EQQTWSIN record.
- Use the EX0WS structure to map the EX0BODY field of EX0EVENT.

And, if you want to determine the workstation event status in the EQQTWSOU data set:

- Check the first 4 bytes of the record (EVERECTYPE of DCLEVE). The correct value must be 'WSCG'.
- Use the EX0TWS structure from the 25th byte of the EQQTWSOU record.
- Use the EX0WS structure to map the EX0TWSBODY field of EX0TWS.

## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EX0	TOPOLOGY IN EVENT DATA. THE LENGTH OF THIS FIELD MUST BE MINOR THAN OR EQUAL TO EXR BLOCK LENGTH
0	(0)	CHARACTER	1	EX0SYST	'0= TYPE EVENT TIVOLI WORKLOAD SCHEDULER
1	(1)	CHARACTER	1	EX0TYPE	TYPE INDICATOR
2	(2)	CHARACTER	22	*	RESERVED
24	(18)	CHARACTER	52	EX0INPUTEVENT	INPUT EVENT IN EVE CONTROL BLOCK
76	(4C)	CHARACTER	4	EX0OPCID	EVENT ID (EQQ0)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	52	EX0EVENT	
0	(0)	SIGNED	4	EX0CDAT	CREATION DATE (00YYDDDF)
4	(4)	SIGNED	4	EX0CTIM	CREATION TIME (SEC* 100)
8	(8)	SIGNED	2	EX0GMTOF	GMT OFFSET (MINUTES)
10	(A)	BITSTRING	1	EX0FLAGS	
				EX0SUSPD	SUSPENDED EVENT
				*	FREE
11	(B)	CHARACTER	1	*	RESERVED
12	(C)	CHARACTER	40	EX0BODY	INPUT EVENT BODY. TO MAP THIS BODY SEE THE FOLLOWING EVENT DATA

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	136	EX0TWS1	TOPOLOGY OUT EVENT DATA
0	(0)	CHARACTER	136	EX0TWISEVENT1	OUTPUT EVENT IN EVE CB
0	(0)	CHARACTER	4	EX0TWSCOMMON1	COMMON PART
0	(0)	CHARACTER	1	EX0TWSYST1	0=TYPE EVENT MAESTRO
1	(1)	CHARACTER	1	EX0TWSYTYPE1	INDICATOR
2	(2)	CHARACTER	1	EX0TWSXTYPE1	EXTENDED TYPE INDICATOR
3	(3)	CHARACTER	1	*	FREE
4	(4)	CHARACTER	132	EX0TWSBODY1	TOPOLOGY OUTPUT EVENT BODY. TO MAP THIS BODY SEE THE FOLLOWING EVENT DEPENDENT DATA

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	6	EX0WS	WORKSTATION EVENT BODY
0	(0)	CHARACTER	4	EX0WSID	WORKSTATION NAME
4	(4)	CHARACTER	1	EX0SLNK	WORKSTATION LINK STATUS: L=LINKED U=UNLINKED
5	(5)	CHARACTER	1	EX0WSSTA	WORKSTATION STATUS: A=ACTIVE O=OFFLINE
6	(6)	CHARACTER	1	EX0WSFLK	FTA WORKSTATION FULLY LINKED: Y=FULLY LINKED N=NOT FULLY LINKED
7	(7)	CHARACTER	1	EX0WSFTYP	NODE TYPE



## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
8	(8)	CHARACTER	16	EX0WSDOMAIN	DOMAIN NAME
24	(18)	CHARACTER	1	EX0WSFLAGS	
		1... ..		EX0WSCHGLIMIT	CHANGE WORKSTATION LIMIT
		.111 1111		*	FREE
25	(19)			*	AVOID COMPILER MSG
26	(1A)	UNSIGNED	2	EX0WSLIMIT	NEW WORKSTATION LIMIT

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	20	EX0WSMGR	WORKSTATION EVENT BODY
0	(0)	CHARACTER	4	EX0WSN	WORKSTATION NAME
4	(4)	CHARACTER	16	EX0WSDOM	WORKSTATION DOMAIN MANAGER

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	40	EX0JOB	TRACKER EVENT RECORD
0	(0)	CHARACTER	8	EX0JOBOCCTK	OCCURRENCE TOKEN
8	(8)	SIGNED	2	EX0JOBNUM	OPERATION NUMBER
10	(A)	CHARACTER	4	EX0JOBWS	WORKSTATION NAME
14	(E)	CHARACTER	1	EX0JOBSTA	OPERATION STATUS: E=ERROR S=STARTED C=COMPLETED D=DELETED U=UNDECIDED T=TERMINATED
15	(F)	CHARACTER	1	EX0JOBFLAGS	
				*	RESERVED
16	(10)	CHARACTER	24	EX0JOBISRECJOB EX0JOBBUFF	EVENT IS FOR RECOVERY JOB JOB EVENT BUFFER. TO MAP THIS FIELD SEE THE EX0JOBMAPS AND EX0JOBMAPT STRUCTURES

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	24	EX0JOBMAPS	JOB EVENT BUFFER MAP FOR STARTED STATUS
0	(0)	CHARACTER	4	*	FOR ALIGNEMENT WITH OLD EVENT
4	(4)	CHARACTER	8	EX0JOBID	JOB NUMBER IN STRING FORMAT
12	(C)	SIGNED	4	EX0JOBIDNUM	JOB NUMBER NUMERIC
16	(10)	CHARACTER	8	*	FREE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	25	EX0JOBMAPT	JOB EVENT BUFFER MAP FOR STATUS TERM/PROMPT
0	(0)	SIGNED	4	EX0JOBERRC	ERROR CODE
4	(4)	CHARACTER	4	EX0JOBRECWS	RECOVERY JOB WORKSTATION

## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
8	(A)	SIGNED	2	EX0JOBMSGNO	RECOVERY PROMPT NUMBER
10	(C)	SIGNED	2	EX0JOBMSGLEN	RECOVERY PROMPT LENGTH
12	(C)	CHARACTER	1	EX0JOBRECTYPE	RECOVERY TYPE
					S = STOP C = CONTINUE R = RERUN
13	(D)	CHARACTER	1	EX0JOBPRMPTANS	PROMPT ANSWER Y/N
14	(E)	BITSTRING	1	EX0JOBRECCOND	RECOVERY CONDITIONS
				EX0JOBRECOVERY	JOB RECOVERED
				EX0JOBRECJOB	RECOVERY JOB
				EX0JOBRECMMSG	WAIT ON MESSAGE
				EX0JOBFAIL	ON IF STATUS=E FAIL
				*	FREE
15	(F)	CHARACTER	10	*	FREE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	70	EX0TWSJOB	TRACKER EVENT RECORD
0	(0)	CHARACTER	8	EX0TJBOCCTOKEN	OCCURRENCE TOKEN
8	(8)	SIGNED	2	EX0TJBOPNUMBER	OPERATION NUMBER
10	(A)	CHARACTER	16	EX0TJBADNAME	APPLICATION NAME
26	(1A)	CHARACTER	6	EX0TJBWS	WORKSTATION INFORMATION
26	(1A)	CHARACTER	4	EX0TJBWSNAME	WORKSTATION NAME
30	(1E)	CHARACTER	1	EX0TJBWSTYPE	WORKSTATION TYPE
31	(1F)	CHARACTER	1	*	JOB NUMBER
32	(20)	BITSTRING	2	EX0TJBCOMMANDS	COMMANDS FLAGS
				EX0TJBEXECUTE	EXECUTE JOB
34	(22)	BITSTRING	2	EX0TJBACCTIONSFLAGS	ACTIONS FLAGS
				EX0TJBCHGSTATUS	STATUS CHANGED
				EX0TJBCHGIA	INPUT ARRIVAL CHANGED
				EX0TJBCHGLATESTTM	LATEST STR TIME CHANGED
				EX0TJBCHGHOLDREL	HOLD/RELEASE CHANGED
				EX0TJBCHGTIMEDEP	TIME DEPENDENCY CHANGED
				EX0TJBCHGSUPPLATE	SUPPR IF LATE CHANGED
				EX0TJBCHGPRIORITY	PRIORITY CHANGED
				EX0TJBCHGDEADLINE	DEADLINE CHANGED
36	(24)	CHARACTER	42	EX0TJBACCTIONS	ACTIONS
36	(24)	CHARACTER	2	EX0TJBSTATUS	OPERATION STATUS
36	(24)	CHARACTER	1	EX0TJBOLDSTATUS	OLD STATUS
37	(25)	CHARACTER	1	EX0TJBNEWSTATUS	NEW STATUS
38	(26)	CHARACTER	10	EX0TJBIA	INPUT ARRIVAL
38	(26)	CHARACTER	6	EX0TJBIA DATE	INPUT ARRIVAL DATE
44	(2C)	CHARACTER	4	EX0TJBIA TIME	INPUT ARRIVAL TIME
48	(30)	CHARACTER	12	EX0TJBLATESTTM	LATEST STR TIME
48	(30)	CHARACTER	6	EX0TJBLATDATE	
54	(36)	CHARACTER	2	*	
56	(38)	CHARACTER	4	EX0TJBLATTIME	
60	(3C)	CHARACTER	2	*	
				EX0TJBHOLDREL	HOLD/RELEASE JOB
				EX0TJB TIMEDEP	TIME DEPENDENCY
				EX0TJBSUPPLATE	SUPPR IF LATE
				EX0TJB JNFORMAT	TWS JOBNAME FORMAT
62	(3E)	SIGNED	2	EX0TJB PRIORITY	OPERATION PRIORITY

## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
64	(40)	SIGNED	2	EX0TJBOPNUMBEREX	OPERATION NUMBER EXTENSION
66	(42)	CHARACTER	2	EX0TJBEXTSTATUS	EXTENDED STATUS FOR FT
66	(42)	BITSTRING	1	EX0TJBOLDSTFLG EX0TJBOFSTART EX0TJBOFSENDING EX0TJBOFSUBER EX0TJBOFERFAIL EX0TJBOFRECPMP EX0TJBOFRECJOB EX0TJBOFRECRUN *	OLD FLAGS
67	(43)	BITSTRING	1	EX0TJBNEWSTFLG EX0TJBNFSTART EX0TJBNFSENDING EX0TJBNFSUBER EX0TJBNFERFAIL EX0TJBNFRECPMP EX0TJBNFRECPJOB EX0TJBNFRECRUN *	NEW FLAGS
68	(44)	CHARACTER	6	EX0TJBDEADLDATE JOB	DEADLINE DATE
78	(4E)	CHARACTER	32	EX0TJBJOBINFO	JOB INFO

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	68	EX0TWSJOBADD	ADD JOB EVENT RECORD
0	(0)	CHARACTER	8	EX0TJAOCCTOKEN	OCCURRENCE TOKEN
8	(8)	SIGNED	2	EX0TJAOPNUMBER	OPERATION NUMBER
10	(A)	SIGNED	2	EX0TJAOPNUMBEREX	OPERATION NUMBER EXT
12	(C)	CHARACTER	16	EX0TJAADNAME	APPLICATION NAME
28	(1C)	CHARACTER	5	EX0TJAWS	WORKSTATION INFORMATION
28	(1C)	CHARACTER	4	EX0TJAWSNAME	WORKSTATION NAME
32	(20)	CHARACTER	1	EX0TJAWSTYPE	WORKSTATION TYPE
33	(21)	CHARACTER	1	EX0TJASTATUS	OPERATION STATUS
34	(22)	CHARACTER	10	EX0TJAIA	INPUT ARRIVAL
34	(22)	CHARACTER	6	EX0TJAIAADATE	INPUT ARRIVAL DATE
40	(28)	CHARACTER	4	EX0TJAIAATIME	INPUT ARRIVAL TIME
44	(2C)	CHARACTER	12	EX0TJALATESTTM	LATEST STR TIME
44	(2C)	CHARACTER	6	EX0TJALATDATE	
50	(32)	CHARACTER	2	*	
52	(34)	SIGNED	4	EX0TJALATTIME	
56	(38)	CHARACTER	2	*	
				EX0TJAHOLDREL	HOLD/RELEASE JOB
				EX0TJATIMEDEP	TIME DEPENDENCY
				EX0TJASUPPLATE	SUPPR IF LATE
				EX0TJACSCRIPT	CENTRALIZED SCRIPT
				EX0TJAJNFORMAT	TWS JOBNAME FORMAT
58	(3A)	SIGNED	2	EX0TJAPRIORITY	OPERATION PRIORITY
60	(3C)	CHARACTER	6	EX0TJADEADLDATEJOB	JOB DEADLINE DATE
66	(42)	CHARACTER	4	EX0TJADEADLTIMEJOB	JOB DEADLINE TIME

## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
70	(46)	CHARACTER	6	EX0TJAOCCDLDATE	OCCURRENCE DEADLINE DATE
76	(4C)	CHARACTER	4	EX0TJAOCCDLTIME	OCCURRENCE DEADLINE TIME
80	(50)	CHARACTER	32	EX0TJAJOBINFO	JOB INFO JOB NAME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	68	EX0JRJD	RELEASE DEP EVENT
0	(0)	CHARACTER	1	EX0JRDFLAGS	FLAGS
		1... ..		EX0JRJDJNFORMAT	TIVOLI WORKLOAD SCHEDULER FOR z/OS JOB NAME FORMAT
1	(1)	CHARACTER	3	*	FREE
4	(4)	CHARACTER	16	EX0JRDOCCNAME	OCCURRENCE NAME
20	(14)	CHARACTER	8	EX0JRDOCCTOKEN	OCCURRENCE TOKEN
28	(1C)	SIGNED	2	EX0JRDOPNUMBER	OPERATION NUMBER
30	(1E)	SIGNED	2	EX0JRDOPNUMBEREX	OPERATION NUMBER EXTD
32	(20)	CHARACTER	32	EX0JRJDJOBINFO	JOB INFO
64	(40)	CHARACTER	4	EX0JRDOPS	JOB CPU

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	21	EX0OCCCHG	CHANGE OCCURRENCE EVENT RECORD
0	(0)	CHARACTER	8	EX0OCCCHGTOKEN	OCCURRENCE TOKEN
8	(8)	BITSTRING	2	EX0OCCCHGCHGACTIONS	ACTIONS FLAGS
				EX0OCCCHGCHGHOLDREL	HOLD/RELEASE CHANGED
				EX0OCCCHGCHGDEADLINE	DEADLINE CHANGED
10	(A)	CHARACTER	11	EX0OCCCHGCHGACTIONS	ACTIONS CHANGED
10	(A)	CHARACTER	1	*	
				EX0OCCCHGHOLDREL	HOLD/RELEASE OCCURRENCE
11	(B)	CHARACTER	6	EX0OCCCHGDEADLDATE	DEADLINE DATE
17	(11)	CHARACTER	4	EX0OCCCHGDEADLTIME	DEADLINE TIME
21	(15)	CHARACTER	2	EX0OCCCHGSTATUS	CHANGED STATUS
21	(15)	CHARACTER	1	EX0OCCCHGOLDSTATUS	OLD STATUS
22	(16)	CHARACTER	1	EX0OCCCHGNEWSTATUS	NEW STATUS
23	(17)	CHARACTER	1	*	FREE
24	(18)	CHARACTER	16	EX0OCCCHGNAME	OCCURRENCE NAME
40	(28)	SIGNED	2	EX0OCCCHGIADATE	INPUT ARRIVAL DATE
42	(2A)	SIGNED	2	EX0OCCCHGIATIME	INPUT ARRIVAL TIME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	9	EX0OCCADD	ADD OCCURRENCE EVENT RECORD
0	(0)	CHARACTER	8	EX0OCCADDTOKEN	OCCURRENCE TOKEN
8	(8)	CHARACTER	16	EX0OCCADDID	OCCURRENCE IDENTIFIER
24	(18)	CHARACTER	6	EX0OCCADDIAD	OCCURRENCE IA DATE
30	(1E)	CHARACTER	4	EX0OCCADDIAT	OCCURRENCE IA TIME

## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
34	(22)	CHARACTER	1	*	
		1... ..		EX0OCCADDHOLDREL	HOLD/RELEASE OCCURRENCE
35	(23)	CHARACTER	6	EX0OCCADDDEADLDATE	DEADLINE DATE
41	(29)	CHARACTER	4	EX0OCCADDDEADLTIME	DEADLINE TIME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	47	EX0JUSR	USER EVENT RECORD
0	(0)	CHARACTER	47	EX0JUSRNAME	USER NAME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	2	EX0JDEF	JOB DEFINITION
0	(0)	BITSTRING	2	EX0JDEFFLAGS	TYPE OF JOB
				EX0JDEFISCOMMAND	COMMAND
				EX0JDEFINTERACT	INTERACTIVE
				EX0JDEFCONTINUE	CONTINUE RECOVERY OPTION
				EX0JDEFRERUN	RERUN RECOVERY OPTION
0	(0)	BITSTRING	1	*	FREE
2	(2)	CHARACTER		EX0JDEFBODY	JOB DEFINITION OPTION

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	2	EX0PDEF	JOB DEFINITION
0	(0)	BITSTRING	2	EX0PDEFFLAGS	TYPE OF JOB
0	(0)	BITSTRING	2	*	FREE
2	(2)	CHARACTER		EX0PDEFBODY	JOB DEFINITION OPTION

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	60	EX0DEP	TRACKER EVENT RECORD
0	(0)	CHARACTER	1	EX0DEPACTION	DEPENDENCY ACTION
1	(1)	CHARACTER	2	*	FREE
3	(3)	CHARACTER	1	EX0DEPFLAGS	ACTIONS FLAGS
				EX0DEPPENDINGPRED	PENDING PREDECESSOR
				EX0DEPJNFORMAT	TWS JOBNAME FORMAT
				EX0DEPJNFORMATPRED	TWS JOBNAME FORMAT OF THE PREDECESSOR
4	(4)	CHARACTER	16	EX0DEPOCCNAME	OCCURENCE NAME
20	(14)	CHARACTER	8	EX0DEPOCCTOKEN	OCCURRENCE TOKEN
28	(1C)	SIGNED	2	EX0DEPIADATE	INPUT ARRIVAL DATE
30	(1E)	SIGNED	2	EX0DEPIATIME	INPUT ARRIVAL TIME
32	(20)	SIGNED	2	EX0DEPOPNUMBER	OPERATION NUMBER
34	(22)	SIGNED	2	EX0DEPOPNUMBEREX	OPERATION NUMBER EXT
36	(24)	CHARACTER	16	EX0DEPOCCNAMEPRED	PREDECESSOR OCCURENCE NAME
52	(34)	CHARACTER	8	EX0DEPOCCTOKENPRED	PREDECESSOR OCCURENCE TOKEN
60	(3C)	SIGNED	2	EX0DEPIADATEPRED	INPUT ARRIVAL DATE PREDECESSOR

## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
62	(3E)	SIGNED	2	EX0DEPIATIMEPRED	INPUT ARRIVAL TIME PREDECESSOR
64	(40)	SIGNED	2	EX0DEPOPNUMBERPRED	PREDECESSOR OPERATION NUMBER
66	(42)	SIGNED	2	EX0DEPOPNUMBEREXPRED	OPERATION NUMBER EXT
68	(44)	CHARACTER	32	EX0DEPJOBINFO	JOB INFO
100	(64)	CHARACTER	32	EX0DEPJOBINFOPRED	PREDECESSOR JOB INFO

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	32	EX0SR	TRACKER EVENT RECORD
0	(0)	CHARACTER	1	EX0SRACTION	SPEC RES ACTION
1	(1)	CHARACTER	1	EX0SRFLAGS	FLAGS
				EX0SRJNFORMAT	TWS JOBNAME FORMAT
2	(2)	CHARACTER	2	*	FREE
4	(4)	CHARACTER	16	EX0SROCCNAME	OCCURRENCE NAME
20	(14)	CHARACTER	8	EX0SROCCTOKEN	OCCURRENCE TOKEN
28	(1C)	SIGNED	2	EX0SROPNUMBER	OPERATION NUMBER
30	(1E)	SIGNED	2	EX0SROPNUMBEREX	OPERATION NUMBER EXTENDED
32	(20)	CHARACTER	32	EX0SRJOBINFO	JOB INFO
64	(40)	CHARACTER	4	EX0SROPWS	JOB CPU
68	(44)	SIGNED	2	EX0SRIADATE	INPUT ARRIVAL DATE
70	(46)	SIGNED	2	EX0SRIATIME	INPUT ARRIVAL TIME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	37	EX0LOG	TRACKER EVENT RECORD
0	(0)	CHARACTER	8	EX0LOGOCCTOKEN	OCCURRENCE TOKEN
8	(8)	SIGNED	2	EX0LOGOPNUMBER	OPERATION NUMBER
10	(A)	SIGNED	2	EX0LOGOPNUMBEREX	OPERATION NUMBER EXTENDED
12	(C)	STRUCTURE	16	EX0LOGOCCNAME	OCCURRENCE NAME
28	(1C)	CHARACTER	8	EX0LOGUSER	USERID TO BE NOTIFIED
36	(24)	STRUCTURE	1	EX0LOGACTION	RETRIEVE RESULT R/C/E
37	(25)	BITSTRING	1	*	
				EX0LOGRECJOB	RECOVERY JOB LOG
				EX0LOGJNFORMAT	TWS JOBNAME FORMAT
				*	FREE
38	(26)	CHARACTER	2	*	FREE
40	(28)	CHARACTER	4	EX0LOGWSNAME	WORKSTATION NAME
44	(2C)	SIGNED	2	EX0LOGSTARTTIME	JOB START TIME
46	(2E)	SIGNED	2	EX0LOGSTARTDATE	JOB START DATE
48	(30)	SIGNED	4	EX0LOGJOBID	JOB NUMBER NUMERIC
52	(34)	CHARACTER	32	EX0LOGJOBINFO	JOB INFO
84	(54)	SIGNED	2	EX0LOGIADATE	INPUT ARRIVAL DATE
86	(56)	SIGNED	2	EX0LOGIATIME	INPUT ARRIVAL TIME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	56	EX0JCL	TRACKER EVENT RECORD
0	(0)	CHARACTER	8	EX0JCLOCCTOKEN	OCCURRENCE TOKEN

## EX0 - Tivoli Workload Scheduler event data

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
8	(8)	UNSIGNED	1	EX0JCLOPNUMBER	OPERATION NUMBER
9	(9)	UNSIGNED	1	EX0JCLOPNUMBEREX	OPERATION NUMBER EXTENSION
10	(A)	CHARACTER	1	EX0JCLACTION	RETRIEVE RESULT R/C/E
11	(B)	CHARACTER	1	EX0JCLFLAGS	FOR ALIGNMENT
				EX0JCLJNFORMAT	TWS JOBNAME FORMAT
12	(C)	CHARACTER	16	EX0JCLOCCNAME	OCCURRENCE NAME
28	(1C)	CHARACTER	8	EX0JCLUSER	USER
36	(24)	CHARACTER	4	EX0JCLWSNAME	WORKSTATION NAME
40	(28)	SIGNED	4	EX0JCLLINE	JCL LINES NUMBER
44	(2C)	SIGNED	4	EX0JCLSIZE	JCL SIZE
48	(30)	CHARACTER	8	EX0JCLFILENAME	JCL FILE NAME
56	(38)	CHARACTER	32	EX0JCLJOBINFO	JOB INFO
88	(58)	SIGNED	2	EX0JCLIADATE	INPUT ARRIVAL DATE
90	(5A)	SIGNED	2	EX0JCLIATIME	INPUT ARRIVAL TIME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	5	EX0PRM	PROMPT EVENT RECORD
0	(0)	UNSIGNED	4	EX0PRMMSGNUM	PRMPT MESSAGE NUMBER
4	(4)	CHARACTER	1	EX0PRMSTATUS	REPLY Y/N

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	8	EX0SYN	SYNCHRONIZATION EVENT
0	(0)	CHARACTER	3	*	
3	(3)	CHARACTER	1	EX0SYNCTYPE	SYNCHRONIZATION TYPE
4	(4)	SIGNED	4	EX0SYMRUNNUM	SYMPHONY RUN NUMBER

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	8	EX0T0	SET TIME EVENT
0	(0)	CHARACTER	4	EX0T0SID	SYSTEM ID
4	(4)	SIGNED	4	EX0T0GMTOF	GMT OFFSET

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	1	EX0JSUB	JOB SUBMISSION
0	(0)	CHARACTER	1	EX0JSUBACTION	ACTIVATE/DEACTIVATE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EX0KILL	KILL EVENT RECORD
0	(0)	CHARACTER	8	EX0KILLOCCTOKEN	OCCURRENCE TOKEN
8	(8)	CHARACTER	16	EX0KILLADNAME	APPLICATION NAME
24	(18)	CHARACTER	10	EX0KILLIA	INPUT ARRIVAL
24	(18)	CHARACTER	6	EX0KILLIADATE	INPUT ARRIVAL DATE
30	(1E)	CHARACTER	4	EX0KILLIATIME	INPUT ARRIVAL TIME
34	(22)	CHARACTER	1	EX0KILLFLAGS	FLAGS
		1... ....		EX0KILLRECJOB	KILL FOR RECOVERY JOB

## EX0 - Tivoli Workload Scheduler event data

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
		.1. ....		EX0KILLJNFORMAT	TIVOLI WORKLOAD SCHEDULER FOR z/OS JOB NAME FORMAT
		..1. ....		EX0KILLCSCRIPT	CENTRALIZED
35	(23)	CHARACTER	1	*	FREE
36	(24)	CHARACTER	4	EX0KILLWS	WORKSTATION NAME
40	(28)	SIGNED	4	EX0KILLJOBID	JOB ID
44	(2C)	SIGNED	2	EX0KILLOPNUMBER	OPERATION NUMBER
46	(2E)	SIGNED	2	EX0KILLOPNUMBEREX	OPERATION NUMBER EXTENDED
48	(30)	SIGNED	32	EX0KILLJOBINFO	JOB INFO

## Cross reference

Name	Hex Offset	Hex Value	Level
EX0	0		1
EX0BODY	C		2
EX0CDAT	0		2
EX0CTIM	4		2
EX0DEP	0		1
EX0DEPACTION	0		2
EX0DEPFLAGS	3		2
EX0DEPIADATE	1C		2
EX0DEPIADATEPRED	3C		2
EX0DEPIATIME	1E		2
EX0DEPIATIMEPRED	3E		2
EX0DEPJNFORMAT	3	40	2
EX0DEPJNFORMATPRED	3	20	2
EX0DEPJJOBINFO	44		2
EX0DEPJJOBINFOPRED	64		2
EX0DEPOCCNAME	4		2
EX0DEPOCCNAMEPRED	20		2
EX0DEPOCCTOKEN	14		2
EX0DEPOCCTOKENPRED	30		2
EX0DEPOPNUMBER	1C		2
EX0DEPOPNUMBEREX	1E		2
EX0DEPOPNUMBEREXPRED	3A		2
EX0DEPOPNUMBERPRED	38		2
EX0DEPPENDINGPRED	3	80	3
EX0EVENT	0		1
EX0FLAGS	A		2
EX0GMTOF	8		2
EX0INPUTEVENT	18		2
EX0JCL	0		1
EX0JCLACTION	A		2
EX0JCLFILENAME	30		2
EX0JCLFLAGS	B		2
EX0JCLIADATE	58		2
EX0JCLIATIME	5A		2
EX0JCLJNFORMAT	B	80	3
EX0JCLJOBINFO	38		2



## EX0 - Tivoli Workload Scheduler event data

Name	Hex Offset	Hex Value	Level
EX0JCLLINE	28		2
EX0JCLOCCNAME	C		2
EX0JCLOCCTOKEN	0		2
EX0JCLOPNUMBER	8		2
EX0JCLOPNUMBEREX	9		2
EX0JCLSIZE	2C		2
EX0JCLUSER	1C		2
EX0JCLWSNAME	24		2
EX0JDEF	0		1
EX0JDEFBODY	2		2
EX0JDEFCONTINUE	0	20	3
EX0JDEFFLAGS	0		2
EX0JDEFINTERACT	0	40	3
EX0JDEFISCOMMAND	0	80	3
EX0JDEFRERUN	0	10	3
EX0JOB	0		1
EX0JOBBUFF	10		1
EX0JOBERRC	0		2
EX0JOBFAIL	E	10	3
EX0JOBFLAGS	F		2
EXJOBID	4		2
EX0JOBIDNUM	C		2
EX0JOBISRECJOB	F	01	3
EX0JOBMAPS	0		1
EX0JOBMAPT	0		1
EX0JOBMSGLEN	A		2
EX0JOBMSGNO	8		2
EX0JOBNUM	8		2
EX0JOBOCCTK	0		2
EX0JOBPRMPTANS	D		2
EX0JOBRECCOND	E		2
EX0JOBRECIJOB	E	40	3
EX0JOBRECMMSG	E	20	3
EX0JOBRECOVERY	E	80	3
EX0JOBRECTYPE	C		2
EX0JOBRECWS	4		2
EX0JOBSTA	E		2
EX0JOBWS	A		2
EX0JRD	0		1
EX0JRDFLAGS	0		2
EX0JRNFORMAT	0	80	3
EX0JRDJOBINFO	20		2
EX0JRDOCCNAME	4		2
EX0JRDOCCTOKEN	14		2
EX0JRDOPNUMBER	1C		2
EX0JRDOPNUMBEREX	1E		2
EX0JRDOPWS	40		2
EX0JSUB	0		1
EX0JSUBACTION	0		2
EX0JUSR	0		1
EX0JUSRNAME	0		2

## EX0 - Tivoli Workload Scheduler event data

Name	Hex Offset	Hex Value	Level
EX0KILL	0		1
EX0KILLADNAME	8		2
EX0KILLCSCRIPT	22	20	3
EX0KILLFLAGS	22		2
EX0KILLIA	18		2
EX0KILLIADATE	18		3
EX0KILLIATIME	1E		3
EX0KILLJNFORMAT	22	40	3
EX0KILLJOBID	28		2
EX0KILLJOBINFO	30		2
EX0KILLOCCTOKEN	0		2
EX0KILLOPNUMBER	2C		2
EX0KILLOPNUMBEREX	2E		2
EX0KILLRECJOB	22	80	3
EX0KILLWS	24		2
EX0LOG	0		1
EX0LOGACTION	24		2
EX0LOGIADATE	54		2
EX0LOGIATIME	56		2
EX0LOGJNFORMAT	25	40	3
EX0LOGJOBID	30		2
EX0LOGJOBINFO	34		2
EX0LOGOCCNAME	C		2
EX0LOGOCCCTOKEN	0		2
EX0LOGOPNUMBER	8		2
EX0LOGOPNUMBEREX	A		2
EX0LOGRECJOB	25	80	3
EX0LOGSTARTDATE	2E		2
EX0LOGSTARTTIME	2C		2
EX0LOGUSER	1C		2
EX0LOGWSNAME	28		2
EX0OCCADD	0		1
EX0OCCADDDEADLDATE	9		2
EX0OCCADDDEADLTIME	F		2
EX0OCCADDHOLDREL	8	80	3
EX0OCCADDIAD	18		2
EX0OCCADDIAT	1E		2
EX0OCCADDID	8		2
EX0OCCADDTOKEN	0		2
EX0OCCCHG	0		1
EX0OCCCHGCHGACTIIONS	A		2
EX0OCCCHGCHGACTIIONSFLAGS	8		2
EX0OCCCHGCHGDEADLINE	8	40	3
EX0OCCCHGCHGHOLDREL	8	80	3
EX0OCCCHGDEADLDATE	B		3
EX0OCCCHGDEADLTIME	11		3
EX0OCCCHGHOLDREL	A	80	3
EX0OCCCHGIADATE	28		2
EX0OCCCHGIATIME	2A		2
EX0OCCCHGNAME	18		2
EX0OCCCHGNEWSTATUS	16		4

## EX0 - Tivoli Workload Scheduler event data

Name	Hex Offset	Hex Value	Level
EX0OCCCHGOLDSTATUS	15		4
EX0OCCCHGSTATUS	15		3
EX0OCCCHGTOKEN	15		4
EX0OPCID	4C		2
EX0PDEF	0		1
EX0PDEFBODY	2		2
EX0PDEFFLAGS	0		2
EX0PRM	0		1
EX0PRMMSGNUM	0		2
EX0PRMSTATUS	4		2
EX0SR	0		1
EX0SRACTION	0		2
EX0SRFLAGS	1		2
EX0SRIADATE	44		2
EX0SRIATIME	46		2
EX0SRJNFORMAT	1	80	3
EX0SROCCNAME	4		2
EX0SROCCTOKEN	14		2
EX0SROPNUMBER	1C		2
EX0SROPNUMBEREX	1E		2
EX0SROPWS	40		2
EX0SUSPD	10	80	3
EX0SYMRUNNUM	4		2
EX0SYN	0		1
EX0SYNCTYPE	3		2
EX0SYST	0		2
EX0TJAADNAME	C		2
EX0TJACSCRIPT	38	10	3
EX0TJADEADLDATE	3C		2
EX0TJADEADLTIME	42		2
EX0TJAHOLDREL	38	80	3
EX0TJAIA	22		2
EX0TJAIADATE	22		3
EX0TJAIATIME	28		3
EX0TJAJNFORMAT	38	08	3
EX0TJAJOBINFO	50		2
EX0TJALATTIME	34		3
EX0TJAOCDDLDATE	46		2
EX0TJAOCDDLTIME	4C		2
EX0TJAOCCTOKEN	0		2
EX0TJAOPNUMBER	8		2
EX0TJAOPNUMBEREX	A		2
EX0TJAPRIORITY	3A		2
EX0TJASTATUS	21		2
EX0TJASUPPLATE	38	20	3
EX0TJATIMEDEP	38	40	3
EX0TJAUNTDATA	2C		3
EX0TJAUNTILTM	2C		2
EX0TJAUNTTIME	34		3
EX0TJAWS	1C		2
EX0TJAWS	1C		2

## EX0 - Tivoli Workload Scheduler event data

Name	Hex Offset	Hex Value	Level
EX0TJAWSNAME	1C		3
EX0TJAWSTYPE	20		3
EX0TJB ACTIONS	24		2
EX0TJB ACTIONSFLAGS	22		2
EX0TJBADNAME	A		2
EX0TJAUTOSUB	3C	08	4
EX0TJCHGAUTOSUB	23	80	3
EX0TJBCHGDEADLINE	22	01	3
EX0TJBCHGHOLDREL	22	10	3
EX0TJBCHGIA	22	40	3
EX0TJBCHGNOP	23	40	3
EX0TJBCHGLATESTTM	22	20	3
EX0TJBCHGPRIORITY	22	02	3
EX0TJBCHGSTATUS	22	80	3
EX0TJBCHGSUPPLATE	22	04	3
EX0TJBCHGTIMEDEP	22	08	3
EX0TJBCHGUNTILTM	22	20	3
EX0TJB COMMANDS	20		2
EX0TJBSCRIPT	3C	02	4
EX0TJBDEADLDATE	44		3
EX0TJBDEADLTIME	4A		3
EX0TJBEXECUTE	20	80	3
EX0TJBEXTSTATUS	42		3
EX0TJBHOLDREL	3C	80	4
EX0TJBIA	26		3
EX0TJBIA DATE	26		4
EX0TJBIA TIME	2C		4
EX0TJB JNFORMAT	3C	10	4
EX0TJB JNFORMAT	3C	10	4
EX0TJB JOBINFO	4E		2
EX0TJB LATESTTM	30		3
EX0TJB LATTIME	38		4
EX0TJB NEWSTATUS	25		4
EX0TJB NEWSTFLG	43		4
EX0TJB NFERFAIL	43	10	5
EX0TJB NFRECJOB	43	04	5
EX0TJB NFRECPRMP	43	08	5
EX0TJB NFRECRUN	43	02	5
EX0TJB NFSENDING	43	40	5
EX0TJB NFSTART	43	80	5
EX0TJB NFSUBER	43	20	5
EX0TJB NOP	3C	04	4
EX0TJB OCCTOKEN	0		2
EX0TJB OFERFAIL	42	10	5
EX0TJB OFRECJOB	42	04	5
EX0TJB OFRECPRMP	42	08	5
EX0TJB OFRECRUN	42	02	5
EX0TJB OFSENDING	42	40	5
EX0TJB OFSTART	42	80	5
EX0TJB OFSUBER	42	20	5
EX0TJB OLDSTATUS	24		4

## EX0 - Tivoli Workload Scheduler event data

Name	Hex Offset	Hex Value	Level
EX0TJBOLDSTFLG	42		4
EX0TJBOPNUMBER	8		2
EX0TJBOPNUMBEREX	40		3
EX0TJBPRIORITY	3E		3
EX0TJBSTATUS	24		3
EX0TJBSUPPLATE	3C	20	4
EX0TJBTIMEDEP	3C	40	4
EX0TJBUNTDATA	30		4
EX0TJBUNTILTM	30		3
EX0TJBUNTTIME	38		4
EX0TJBWS	1A		2
EX0TJBWSNAME	1A		3
EX0TJBWSTYPE	1E		3
EX0TWS	0		1
EX0TWSBODY	4		3
EX0TWSCOMMON	0		3
EX0TWSSEVENT	0		2
EX0TWSSEXTYPE	2		4
EX0TWSJOB	0		1
EX0TWSJOBADD	0		1
EX0TWSYST	0		4
EX0TWSYTYPE	1		4
EX0TYPE	1		2
EX0T0	0		1
EX0T0GMT0F	4		2
EX0T0SID	0		2
EX0WS	0		1
EX0WSCHGLIMIT	7	80	3
EX0WSDOM	4		2
EX0WSFLAGS	7		2
EX0WSFLK	6		2
EX0WSID	0		2
EX0WSLIMIT	8		2
EX0WSLNK	4		2
EX0WSMGR	0		1
EX0WSN	0		2
EX0WSSTA	5		2

## EX1 - BULKDISC EVENT

Name : DCLEX1

Function:

This segment declares an event record for the BULKDISC command.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	EX1	BULKDISC EVENT
0	(0)	CHARACTER	1	EX1TYPE	1 FOR BULKDISC EVENT
1	(1)	CHARACTER	3	*	RESERVED
4	(4)	CHARACTER	8	EX1USER	NAME OF UPDATING USER

## EX1 - BULKDISC EVENT

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
12	(C)	CHARACTER	4	*	RESERVED
16	(10)	SIGNED	4	EX1CDAT	CREATION DATE (00YYDDDF)
20	(14)	SIGNED	1	EX1CTIM	CREATION TIME (SEC* 100)
24	(18)	CHARACTER	52	*	RESERVED
76	(4C)	CHARACTER	4	EX1OPCID	EVENT ID EQQX

## Cross reference

Name	Hex Offset	Hex Value	Level
EX1	0		1
EX1CDAT	10		2
EX1CTIM	14		2
EX1OPCID	4C		2
EX1TYPE	0		2
EX1USER	4		2

## FOPC - OPERINFO structure

Name : DCLFOPC

Function:

This segment declares the operinfo structure, stored in the controller local data store.

The OPERINFO record is structured as follows:

- 1 OPERINFO
  - 2 common data
  - 2 run info ( )
    - 3 step info ( )
      - 4 DDINFO ( )
        - 5 DSNINFO ( )
        - 5 CATINFO ( )
        - 5 VOLINFO ( )

## Common data segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	OPER_INFO	
0	(0)	CHARACTER	12	OPI_KEY	
0	(0)	CHARACTER	10	OPI_OPRTOK	OPERATION TOKEN
0	(0)	CHARACTER	8	OPI_OCCTOK	OCCURENCY TOKEN
8	(8)	SIGNED	2	OPI_OPRNUM	OPERATION NUMBER
10	(A)	CHARACTER	2	*	RESERVED
12	(C)	CHARACTER	56	OPI_COMMINFO	
12	(C)	CHARACTER	16	OPI_APPLID	APPLICATION ID
28	(1C)	CHARACTER	10	OPI_IATIME	IA TIME
38	(26)	CHARACTER	8	OPI_JOBNAME	JOB NAME
46	(2E)	CHARACTER	8	OPI_JOBID	JOB IDENTIFIER
54	(36)	CHARACTER	2	*	RESERVED
56	(38)	SIGNED	4	OPI_JCLRBA	JCL RBA
60	(3C)	SIGNED	4	OPI_TOTOPSIZE	TOTAL LENGTH OF OPERINFO
64	(40)	SIGNED	2	OPI_OPRUNCTR	NUMBER OF RUNS OF THE OPERATION

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
66	(42)	SIGNED	2	OPI_TOTSTPCTR	STEP COUNTER NUMBER OF STEPS
68	(44)	CHARACTER	*	OPI_VARDATA	
68	(44)	CHARACTER	1	OPI_VARBYTE(*)	

### Run info segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	32	OPI_RUNINFO	
0	(0)	SIGNED	4	OPI_NXTRUNRBA	NEXT RUN
4	(4)	SIGNED	2	OPI_RUNID	NUMBER OF RUN
6	(6)	SIGNED	2	OPI_STEPCTR	STEP COUNTER NUMBER OF STEPS
8	(8)	CHARACTER	8	OPI_JOBDT	
8	(8)	CHARACTER	4	OPI_JYEAR	YEAR OF JOBDATE
12	(C)	CHARACTER	2	OPI_JMONTH	MONTH OF JOBDATE
14	(E)	CHARACTER	2	OPI_JDAY	DAY OF JOBDATE
16	(10)	CHARACTER	8	OPI_JOBTM	JOBTIME IN X'HHMMSSHH' FORM
24	(18)	CHARACTER	8	OPI_RUNJOBID	JES JOB IDENTIFIER

### Step info sub-segment

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	44	OPI_STPINFO	
0	(0)	SIGNED	4	OPI_NXTSTPRBA	NEXT STEP POSITION IN OPERINFO AREA
4	(4)	CHARACTER	8	OPI_STEPNAME	STEP NAME
12	(C)	CHARACTER	8	OPI_PRSTNAME	PROCSTEP NAME
20	(14)	SIGNED	2	OPI_STEPNUMB	STEP NUMBER
22	(16)	CHARACTER	5	OPI_STEPCODE	COMPLETION CODE (RC, USER, SYSTEM, FLUSH)
27	(1B)	CHARACTER	8	OPI_PGMNAME	PROGRAM NAME
35	(23)	CHARACTER	1	OPI_STEPSTAT	STEP STATUS
36	(24)	CHARACTER	2	OPI_RESCHAR	RESERVED
38	(26)	SIGNED	2	OPI_STPRUNID	NUMBER OF RUN
40	(28)	SIGNED	4	OPI_DDCTR	NUMBER OF DDS IN STEP

### DDINFO Sub-segment:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	24	OPI_DDINFO	
0	(0)	SIGNED	4	OPI_NXTDDRBA	NEXT DD POSITION WITHIN OPERINFO
4	(4)	CHARACTER	8	OPI_DDNAME	DDNAME - FILENAME OR STEPCAT OR JOBCA
12	(C)	SIGNED	4	OPI_DDNUMB	DD PROGRESSIVE NUMBER IN THE STEP

## FOPC - OPERINFO structure

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
16	(10)	SIGNED	2	OPI_DDRUNID	NUMBER OF RUN WHERE THE DD WAS ALLOCATED
18	(12)	CHARACTER	1	OPI_DDTYPE	DD TYPE: U=USER S=STEP CAT
19	(13)	CHARACTER	1	OPI_DDINFOX	EXTRA INFO ABOUT DD (BIT BATTERY)
				OPI_DDPROT	DD PROTECTED
				OPI_DDNEVER	DD: STEP NEVER RE-EXECUTABLE
				OPI_DDNOREST	DD: STEP NEVER RESTARTABLE
				OPI_DDALWAYS	DD: STEP RESTARTABLE
				*	
20	(14)	SIGNED	4	OPI_DSNCTR	NUMBER OF DSN WITHIN THE DD

### DSNINFO Sub-segment:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	82	OPI_DSNINFO	
0	(0)	SIGNED	4	OPI_NXTDSNRBA	NEXT DSN POSITION IN OPERINFO
4	(4)	CHARACTER	44	OPI_DSNAME	DATASET NAME
48	(30)	CHARACTER	1	OPI_DSNINST	DATASET STATUS: N=NEW O=OLD
49	(31)	CHARACTER	4	OPI_DSNOKST	DISP IF STEP IS NORMALLY EXECUTED
53	(35)	CHARACTER	4	OPI_DSNKOST	DISP IF STEP IS ABNORMALLY ENDED
57	(39)	CHARACTER	4	OPI_DSNDNORM	DISP NORMAL FROM JCL
61	(3D)	CHARACTER	4	OPI_DSNDABNM	DISP ABNORMAL FROM JCL
65	(41)	CHARACTER	1	OPI_DSNSTAT	STATUS OF DATASET AT END OF LAST JOBEXE
66	(42)	CHARACTER	1	OPI_DSNTYPE	ID DATASET AS GDG, SMS MANAGED
				OPI_GDG	.. DATASET IS A GDG
				OPI_SMS	.. DATASET IS SMS MANAGED
				OPI_VSAM	.. DATASET IS A VSAM
				OPI_MIGR	.. DATASET IS MIGRAT
				OPI_REFBK	.. DATASET IS MIGRAT
				OPI_JBCAT	.. IS A JOBCAT
				OPI_STCAT	.. IS A STEPCAT
				*	*
67	(43)	CHARACTER	1	OPI_DEVTYPE	DEVICE TYPE: D=DASD T=TAPE
68	(44)	CHARACTER	1	OPI_DSNCLEAN	SUBJECT TO CLEAN UP ACTIONS? (Y/N)
69	(45)	CHARACTER	1	OPI_DSNPROT	FLAG INDICATOR: DATASET IS PROTECTED
70	(46)	SIGNED	2	OPI_GDGRELNR	RELATIVE NUMBER FOR GDG
72	(48)	SIGNED	2	OPI_DSNNUMB	PROGRESSIVE DSN NUMBER WITHIN THE DD
74	(4A)	SIGNED	2	OPI_DSNCLNRC	CLEAN UP INTERNAøL REASON CODE
76	(4C)	SIGNED	2	OPI_DSNRUNID	NUMBER OF RUN WHERE THE DSN WAS ALLOCATED



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
78	(4E)	SIGNED	2	OPI_VOLCTR	NUMBER OF VOL FOR THE DATASET
80	(50)	CHARACTER	1	OPI_CATTYPER	CATALOG TYPE: BLANK=MASTERCAT
81	(51)	CHARACTER	1	OPI_DSNFLAGS OPI_VALIDREL  OPI_JCLFLVOL *	OTHER FLAGS VALID GDG RELEASE NUMBER INDICATOR VOLUME FROM JCL EVENT ID 'EQQX'

*CATINFO Sub-segment:*

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	44	OPI_CATLINFO	EXISTS ONLY IF OPI_CATTYPER IS NOT BLANK
0	(0)	CHARACTER	44	OPI_CATNAME	CATALOG NAME

*VOLINFO Sub-segment:*

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	12	OPI_VOLINFO	
0	(0)	CHARACTER	6	OPI_VOLSER	VOLUME SERIAL NUMBER
6	(6)	SIGNED	2	OPI_VOLNUMB	PROGRESSIVE VOL NUMBER
8	(8)	SIGNED	2	OPI_DSNSQNUM	SEQUENCE NUMBER OF THE DATASET
10	(A)	CHARACTER	2	OPI_RESCHAR	RESERVED

## Cross reference

Name	Hex Offset	Hex Value	Level
OPER_INFO	0		1
OPI_APPLID	C		3
OPI_CATLINFO	0		1
OPI_CATNAME	0		2
OPI_CATTYPER	50		2
OPI_COMMINFO	C		2
OPI_DDALWAYS	13	10	3
OPI_DDCTR	28		2
OPI_DDINFO	0		1
OPI_DDINFOX	13		2
OPI_DDNAME	4		2
OPI_DDNEVER	13	40	3
OPI_DDNOREST	13	20	3
OPI_DDNUMB	C		2
OPI_DDPROT	13	80	3
OPI_DDRUNID	10		2
OPI_DDTYPER	12		2
OPI_DEVTYPER	43		2
OPI_DSNAME	4		2

## FOPC - OPERINFO structure

Name	Hex Offset	Hex Value	Level
OPI_DSNCLEAN	44		2
OPI_DSNCLNRC	4A		2
OPI_DSNCCTR	14		2
OPI_DSNDABNM	3D		2
OPI_DSNDNORM	39		2
OPI_DSNFLAGS	51		2
OPI_DSNINFO	0		1
OPI_DSNINST	30		2
OPI_DSNKOST	35		2
OPI_DSNNUMB	48		2
OPI_DSNOKST	31		2
OPI_DSNPROT	45		2
OPI_DSNRUNID	4C		2
OPI_DSNSQNUM	8		2
OPI_DSNSTAT	41		2
OPI_DSNTYPE	42		2
OPI_GDG	42	80	3
OPI_GDGRELNR	46		2
OPI_IATIME	1C		3
OPI_JBCAT	42	04	3
OPI_JCLFLVOL	51	40	3
OPI_JCLRBA	38		3
OPI_JDAY	E		3
OPI_JMONTH	C		3
OPI_JOBBDT	8		2
OPI_JOBID	2E		3
OPI_JOBNAME	26		3
OPI_JOBTM	10		2
OPI_JYEAR	8		3
OPI_KEY	0		2
OPI_MIGR	42	10	3
OPI_NXTDDRBA	0		2
OPI_NXTDSNRBA	0		2
OPI_NXTRUNRBA	0		2
OPI_NXTSTPRBA	0		2
OPI_OCCTOK	0		4
OPI_OPRNUM	8		4
OPI_OPRTOK	0		3
OPI_OPRUNCTR	40		3
OPI_PGMNAME	1B		2
OPI_PRSTNAME	C		2
OPI_REFBK	42	08	3
OPI_RESCHAR	24		2
OPI_RUNID	4		2
OPI_RUNINFO	0		1
OPI_RUNJOBID	18		2
OPI_SMS	42	40	3
OPI_STCAT	42	02	3
OPI_STEPCODE	16		2
OPI_STEPCTR	6		2
OPI_STEPNAME	4		2

Name	Hex Offset	Hex Value	Level
OPI_STEPNUMB	14		2
OPI_STEPSTAT	23		2
OPI_STPINFO	0		1
OPI_STPRUNID	26		2
OPI_TOTOPSIZE	3C		3
OPI_TOTSTPCTR	42		3
OPI_VALIDREL	51	80	3
OPI_VARBYTE	44		3
OPI_VARDATA	44		2
OPI_VOLCTR	4E		2
OPI_VOLINFO	0		1
OPI_VOLNUMB	6		2
OPI_VOLSER	0		2
OPI_VSAM	42	20	3

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## FSAB - Secondary key task control block

Name : DCLFSAB

Function:

This segment declares the secondary key task control block structure.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	37	FSAB	SECONDARY KEYS CLASS
0	(0)	CHARACTER	10	SABOPRTK	OPERATION TOKEN
0	(0)	CHARACTER	8	SABOCCTK	OCCURRENCE TOKEN
8	(8)	SIGNED	2	SABOPRNR	OPERATION NUMBER
10	(A)	CHARACTER	27	SABRESRV	RESERVED CHARS

## FSCB - Current primary index record control block

### FSCB - Current primary index record control block

Name : DCLFSCB

#### Function:

This module contains the declarative of the FSCB structure which maps a generic record of the VSAM file constituting the primary index inside the database of the data store. It is used each time that an internal module of the data store requires a physical direct access to the primary index.

Inside the module, you can distinguish the primary key of the SYSOUT, that is, the key of the KSDS:

- Jobname
- Execution date
- Execution time
- SYSOUT identifier

Other data comprise:

- Structured and unstructured datafile number
- Structured and unstructured datapage RBN (relative block number)
- Structured and unstructured datapage total number

A set of these three elements (separately for structured and unstructured data) constitutes the coordinates used to correctly locate the data portion of the SYSOUT, inside both a structured and unstructured datafile.

Finally, to complete this structure, there is the secondary SYSOUT key. This comprises:

- Occurrence token
- Operation number

These data form the operation token representing, inside the cleanup and restart local data store, the alternative key to get a job log. A filler for future use closes the structure.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	77	FSCB	CPRIMARYIDXREC CONTROL BLOCK
0	(0)	CHARACTER	77	SKPIDXRC	CURRENT PRIMARY KEY
0	(0)	CHARACTER	34	FSXB	PRIMARY KEY CLASS CONTROL BLOCK
0	(0)	CHARACTER	8	SXBJOBNM	JOBNAME
8	(8)	CHARACTER	8	SXBJOBDT	
8	(8)	CHARACTER	4	SXBYEAR	YEAR OF JOBDATE
12	(C)	CHARACTER	2	SXBMONTH	MONTH OF JOBDATE
14	(E)	CHARACTER	2	SXBDAY	DAY OF JOBDATE
16	(10)	CHARACTER	8	SXBJOBTM	JOB TIME IN 'HHMMSSHH' FORMAT
24	(18)	CHARACTER	8	SXBJOBID	JES JOB IDENTIFIER
32	(20)	SIGNED	2	SXBDSID	SYSOUT DD IDENT. IT IS EQUAL TO JES DSID
34	(22)	UNSIGNED	1	SFSTFILN	STRUCTURED DATAFILE FILE NUMBER
35	(23)	UNSIGNED	1	SFUNFILN	UNSTRUC. DATAFILE FILE NUMBER
36	(24)	SIGNED	4	SFSTRBN	SYSOUT RBN IN STRUCTURED DATAFILE
40	(28)	SIGNED	4	SFUNRBN	SYSOUT RBN IN UNSTRUCTURED DATAFILE
44	(2C)	SIGNED	4	SKBUTOTP	TOTAL NUMB.OF PAGES FOR UNSTRUCTURED SYSOUT
48	(30)	SIGNED	4	SKBSTOTP	TOTAL NUMB.OF PAGES FOR STRUCTURED SYSOUT
52	(34)	CHARACTER	10	SABELEM	ELEM.OF SECOND. KEY
52	(34)	CHARACTER	10	SABOPRTK	OPERATION TOKEN

## FSCB - Current primary index record control block

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	CHARACTER	8	SABOCCTK	OCCURRENCE TOKEN
60	(3C)	SIGNED	2	SABOPRNR	OPERATION NUMBER
62	(3E)	CHARACTER	15	SKPFILL	FILER TO COMPLETE PIDX RECORD

### Cross reference

Name	Hex Offset	Hex Value	Level
FSCB	0		1
FSXB	0		3
SABELEM	34		3
SABOCCTK	34		5
SABOPRNR	3C		5
SABOPRTK	34		4
SFSTFILN	22		3
SFSTRBN	24		3
SFUNFILN	23		3
SFUNRBN	28		3
SKBSTOTP	30		3
SKBUTOTP	2C		3
SKPFILL	3E		3
SKPIDXRC	0		2
SXBDAY	E		5
SXBDSID	20		4
SXJOBBDT	8		4
SXJOBID	18		4
SXJOBNM	0		4
SXJOBTM	10		4
SXBMONTH	C		5
SXBYEAR	8		5

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## FSFB - Datafile control block

Name : DCLFSFB

Function:

This module contains the control block that represents the Datafile Sub Task.

There is a Datafile Sub Task for each VSAM file (SDF or UDF) defined to Data Store.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	FSFB	CDATAFILE CTLBLK
0	(0)	CHARACTER	4	SFBDESC	DATAFILE CTL BLOCK
4	(4)	ADDRESS	4	SDBP	MAIN SYSOUTDB CTLBLK ADDRESS
8	(8)	ADDRESS	4	SFBRLSTP	CDATAFILE REQUEST QUEUE
12	(C)	ADDRESS	4	SFBECBAP	CDATAFILE SUBTASK ATTACH
16	(10)	ADDRESS	4	SFBECBOP	CDATAFILE OPEN PROCESS

## FSFB - Datafile control block

Dec	Offsets	Hex	Type	Len	Name (Dim)	Description
20		(14)	UNSIGNED	4	SFBECBAT	CDAFILE SUBTASK ECB
24		(18)	UNSIGNED	4	SFBECBOC	DATAFILE OPEN COMPLETED ECB
28		(1C)	UNSIGNED	4	SFBECBRQ	CDAFILE SUBTASK REQUEST
32		(20)	ADDRESS	4	SFBTCBP	CDAFILE SUBTASK TCB
36		(24)	ADDRESS	4	SMBP	SPACE MAP CTLBLK ADDRESS
40		(28)	CHARACTER	8	SFBRDID	DATAFILE READER DIV
48		(30)	SIGNED	4	SFBRDSIZ	DATAFILE SIZE IN NUMBER OF
52		(34)	CHARACTER	8	SFBUTID	DATAFILE UTILITY DIV
60		(3C)	SIGNED	4	SFBUTSIZ	DATAFILE SIZE IN NUMBER OF
64		(40)	CHARACTER	8	SFBUPID	DATAFILE UPDATE DIV
72		(48)	SIGNED	4	SFBSIZE	DATAFILE SIZE IN NUMBER OF
76		(4C)	SIGNED	4	SFBSTRC	DATAFILE SUBTASK RETURN CODE
80		(50)	SIGNED	4	SFBSTRSC	DATAFILE SUBTASK RETURN CODE
84		(54)	CHARACTER	6	SFBHDPAG	HEADER PAGE CONTENTS
84		(54)	CHARACTER	4	SFBHPDES	HEADER PAGE DESCRIPTOR;
88		(58)	CHARACTER	1	SFFILTYP	DATAFILE TYPE:
89		(59)	UNSIGNED	1	SFFILNUM	DATAFILE FILE NUMBER
90		(5A)	CHARACTER	1	SFBFLAGS	DATAFILE INDICATORS
			1... ....		SFBIMEXF	IMPOSSIBLE EXTENSION FLAG;
			.1.. ....		SFBOPINC	DATAFILE OPEN INCOMPLETE
			..1. ....		SFBRDYF	DATAFILE READY INDICATOR
			...1 ....		SFBCLOSF	DATAFILE CLOSED STATUS
			.... 1...		SFBR00PF	READY (OPEN) FOR READER
			.... .1..		SFBFMTRQ	OPEN WITH FORMAT REQUEST:
			.... ..1.		SFBUTOPF	READY (OPEN IN READ MODE)
91		(5B)	CHARACTER	9	SFBDD	DATAFILE DDNAME STRUCTURE
91		(5B)	UNSIGNED	1	SFBDDLTH	DATAFILE DDNAME LENGTH
92		(5C)	CHARACTER	8	SFBDDN	DATAFILE DDNAME

## Cross reference

Name	Hex Offset	Hex Value	Level
FSFB	0		1
SDBP	4		2
SFBCLOSF	5A	10	3
SFBDD	5B		2
SFBDDLTH	5B		3
SFBDDN	5C		3
SFBDESC	0		2
SFBECBAP	C		2
SFBECBAT	14		2
SFBECBOC	18		2
SFBECBOP	10		2

Name	Hex Offset	Hex Value	Level
SFBECEBRQ	1C		2
SFBFLAGS	5A		2
SFBFMTRQ	5A	04	3
SFBHDPAG	54		2
SFBHPDES	54		3
SFBIMEXF	5A	80	3
SFBOPINC	5A	40	3
SFBRDID	28		2
SFBRDSIZ	30		2
SFBRDYF	5A	20	3
SFBRLSTP	8		2
SFBROOPF	5A	08	3
SFBSIZE	48		2
SFBSTRC	4C		2
SFBSTRSC	50		2
SFBTCBP	20		2
SFBUPID	40		2
SFBUTID	34		2
SFBUTOPF	5A	02	3
SFBUTSIZ	3C		2
SFFILNUM	59		3
SFFILTYP	58		3
SMBP	24		2

## FSIR - Secondary index record structure

Name : DCLFSIR

Function:

This module contains the declarative of the secondary index record structure.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	FSIR	SECONDARY INDEX RECORD STRUCTURE
0	(0)	CHARACTER	40	FSYB	GENERIC SECONDARY ACCESS
0	(0)	CHARACTER	38	SYBVSKEY	SECONDARY ACCESS KEY
0	(0)	UNSIGNED	1	SYBTIPSK	SECONDARY ACCESS KEY TYPE
1	(1)	CHARACTER	37	SYBGSVAL	SECONDARY ACCESS KEY VALUE
1	(1)	CHARACTER	1	SYBGSARR (37)	
1	(1)	CHARACTER	1	SYBGSBYT	SINGLE BYTE OF GENERIC
38	(26)	UNSIGNED	1	SYBGLSLTH	TOTAL LENGTH OF SECONDARY
39	(27)	CHARACTER	1	RESCHAR	RESERVED CHARACTER
40	(28)	SIGNED	2	SIRPKCTR	COUNTER OF STORED PRIMARY KEYS
42	(2A)	CHARACTER	34	SKPIDXRC (*)	CURRENT PRIMARY KEY RECORD
42	(2A)	CHARACTER	34	FSXB	PRIMARY KEY CLASS CONTROL
42	(2A)	CHARACTER	8	SXBJOBNM	JOBNAME
50	(32)	CHARACTER	8	SXBJOBDT	JOBDATE
50	(32)	CHARACTER	4	SXBYEAR	YEAR OF JOBDATE
54	(36)	CHARACTER	2	SXBMONTH	MONTH OF JOBDATE

## FSIR - Secondary index record structure

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
56	(38)	CHARACTER	2	SXBDAY	DAY OF JOBDATE
58	(3A)	CHARACTER	8	SXBJOBTM	JOB TIME IN X'HHMMSSHH' FORMAT
66	(42)	CHARACTER	8	SXBJOBID	JES JOB IDENTIFIER
74	(4A)	SIGNED	2	SXBDSID	SYSOUT DD IDENTIFIER

## Cross reference

Name	Hex Offset	Hex Value	Level
FSIR	0		1
FSXB	2A		3
FSYB	0		2
RESCHAR	27		3
SIRPKCTR	28		2
SKPIDXRC	2A		2
SXBDAY	38		5
SXBDSID	4A		4
SXBJOBDT	32		4
SXBJOBID	42		4
SXBJOBNM	2A		4
SXBJOBTM	3A		4
SXBMONTH	36		5
SXBYEAR	32		5
SYBGSARR	1		5
SYBGSBYT	1		6
SYBGLTH	26		3
SYBGSVAL	1		4
SYBTIPSK	0		4
SYBVSKEY	0		3



## FSPB - Datapage instance structure

Name : DCLFSPB

### Function:

This module contains the declarative of the FSPB structure, which maps a generic datapage of a datafile, that is, a generic 4096 bytes page inside one of the linear VSAM data sets reserved to contain the SYSOUTs represented in the form of either structured or unstructured data. This structure is used by several modules of data store to read / write the SYSOUT data, to interpret, clean, import, and export them.

In the datapage structure you can find:

- A prefix, reserved to identify the sysout inside a specific datafile. Within the more significant prefix data we can list, in the real order:
  - The data page status indicator, which characterizes the data as logically deleted (leftmost bit in on)
  - The primary key of the sysout
  - The RBN (relative block number) of the first page of the SYSOUT
  - The total number of pages that constitute the SYSOUT
  - The secondary key of the SYSOUT
- The information about the real space used to store into the datapage the whole SYSOUT (if a single page can contain it completely) or a portion of it. Clearly, this length excludes the prefix and itself.

The generic area reserved to contain a SYSOUT data portion is expressed as a generic array of single characters. The ability to interpret the contents of the data portion of the datapage is reserved to specific modules of the data store. A SYSOUT data portion inside an *unstructured* datafile is represented as an ordered of variable-length records. However, inside a *structured* datafile, a SYSOUT has a more complex layout, to interpret which further mapping structures are needed.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	4096	FSPB	DATAPAGE INST.STRUC
0	(0)	CHARACTER	86	SPBPRFX	DATAPAGE PREFIX STR
				DPGDELFL	DATAPAGE STATUS INDICATOR
2	(2)	SIGNED	2	RESHALFW	RESERVED HALFWORD
4	(4)	CHARACTER	34	FSXB	PRIMARY KEY CLASS CONTROL
4	(4)	CHARACTER	8	SXBJOBNM	JOBNAME
12	(C)	CHARACTER	8	SXBJOBDT	
12	(C)	CHARACTER	4	SXBYEAR	YEAR OF JOBDATE
16	(10)	CHARACTER	2	SXBMONTH	MONTH OF JOBDATE
18	(12)	CHARACTER	2	SXBDAY	DAY OF JOBDATE
20	(14)	CHARACTER	8	SXBJOBTM	JOB TIME IN 'X'HHMMSSHH'
28	(1C)	CHARACTER	8	SXBJOBID	JES JOB IDENTIFIER
36	(24)	SIGNED	2	SXBDSID	SYSOUT DD IDENTIFIER
40	(28)	SIGNED	4	SPBRBN	RBN OF THE FIRST SYSOUT
44	(2C)	SIGNED	4	SPBTOTPG	TOTAL NUMBER OF PAGES FOR SYSOUT
48	(30)	CHARACTER	37	FSAB	SECONDARY KEYS CLASS
48	(30)	CHARACTER	10	SABOPRTK	OPERATION TOKEN
48	(30)	CHARACTER	8	SABOCCTK	OCCURRENCE TOKEN
56	(38)	SIGNED	2	SABOPRNR	OPERATION NUMBER
58	(3A)	CHARACTER	27	SABRESRV	RESERVED CHARACTERS
85	(55)	CHARACTER	1	RESCHAR	RESERVED CHARACTER
86	(56)	SIGNED	2	SPBDATLT	DATA LENGTH IN DATA DATAPAGE
88	(58)	CHARACTER	4008	SPBDATA	
88	(58)	CHARACTER	1	SPBCHARY(4008)	DATA PAGE DATA
88	(58)	CHARACTER	1	DPGDCHAR	DATAPAGE SINGLEDATA

## FSPB - Datapage instance structure

### Cross reference

Name	Hex Offset	Hex Value	Level
DPGDCHAR	58		4
DPGDELFL	0	80	3
FSAB	30		3
FSPB	0		1
FSXB	4		3
RESCHAR	55		3
RESHALFW	2		3
SABOCCTK	30		5
SABOPRNR	38		5
SABOPRTK	30		4
SABRESRV	3A		4
SPBCHARY	58		3
SPBDATA	58		2
SPBDATLT	56		2
SPBPRFX	0		2
SPBRBN	28		3
SPBTOTPG	2C		3
SXBDAY	12		5
SXBDSID	24		4
SXBJOBDT	C		4
SXBJOBID	1C		4
SXBJOBNM	4		4
SXBJOBTM	14		4
SXBMONTH	10		5
SXBYEAR	C		5

## FSSB - Structured datapage layout

Name : DCLFSSB

Function:

This module contains the declarative of the structured datapage structure.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	4096	FSSB	STRUCTURED DATAPAGE LAYOUT
0	(0)	CHARACTER	86	SPBPRFX	DATAPAGE PREFIX STRUCTURE
				DPGDELFL	DATAPAGE STATUS INDICATOR
2	(2)	SIGNED	2	RESHALFW	RESERVED HALFWORD
4	(4)	CHARACTER	34	FSXB	PRIMARY KEY CLASS CONTROL BLOCK
4	(4)	CHARACTER	8	SXBJOBNM	JOBNAME
12	(C)	CHARACTER	8	SXBJOBDT	
12	(C)	CHARACTER	4	SXBYEAR	YEAR OF JOBDATE
16	(10)	CHARACTER	2	SXBMONTH	MONTH OF JOBDATE
18	(12)	CHARACTER	2	SXBDAY	DAY OF JOBDATE
20	(14)	CHARACTER	8	SXBJOBTM	JOB TIME IN 'X'HHMMSSHH' FORMAT
28	(1C)	CHARACTER	8	SXBJOBID	JES JOB IDENTIFIER

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
36	(24)	SIGNED	2	SXBDSID	SYSOUT DD IDENTIFIER. IT IS EQUAL TO JES JSID
40	(28)	SIGNED	4	SPBRBN	RBN OF THE FIRST SYSOUT DATAPAGE
44	(2C)	SIGNED	4	SPBTOTPG	TOTAL NUMBER OF PAGES FOR SYSOUT
48	(30)	CHARACTER	37	FSAB	SECONDARY KEYS CLASS CONTROL BLOCK
48	(30)	CHARACTER	10	SABOPRTK	OPERATION TOKEN
48	(30)	CHARACTER	8	SABOCCTK	OCCURRENCE TOKEN
56	(38)	SIGNED	2	SABOPRNR	OPERATION NUMBER
58	(3A)	CHARACTER	27	SABRESRV	RESERVED CHARACTERS
85	(55)	CHARACTER	1	RESCHAR	RESERVED CHARACTER
86	(56)	SIGNED	2	SPBDATLT	DATA LENGTH IN DATA PAGE
88	(58)	CHARACTER	4008	SSBPAGDT	DATA PORTION OF A STRUCTURED DATA PAGE
88	(58)	CHARACTER	8	SSBPRFX	
88	(58)	CHARACTER	1	SSBSTRTY	TYPE OF STRUCTURED DATA SECTION: J=EXPANDED JCL C=RESTART AND CLEAN UP
90	(5A)	SIGNED	2	SSBEXENR	EXECUTION NUMBER. IN LOCAL DATA STORE AND ONLY FOR TYPE 'C'. IT IDENTIFIES THE REPEATED EXECUTIONS OF THE SAME OPERATION.
92	(5C)	SIGNED	2	SSBPAPG	NUMBER OF PAGES FILLED OUT FOR A SINGLE STRUCTURED DATA PORTION (SINGLE EXECUTION). IT IS A SUBTOTAL OF THE TOTAL WITHIN THE DATA PAGE PREFIX
94	(5E)	SIGNED	2	SSBPAGNR	PROGRESSIVE NUMBER OF DATA PAGE WITHIN A SINGLE STRUCTURED DATA PORTION (EXPANDED JCL OR SPECIFIC EXECUTION)
96	(60)	CHARACTER	4000	SSBDATA	
96	(60)	CHARACTER	1	SSBCHARY(4000)	STRUCTURED DATA PAGE CHAR ARRAY CONSTITUTING THE DATA PORTION OF STRUCTURED DATA PAGE. IT IS THE GENERIC REPRESENTATION OF STRUCTURED DATA WITHIN A DATA PAGE
96	(60)	CHARACTER	1	DPGDCHAR	DATA PAGE SINGLE DATA CHARACTER

### Cross reference

Name	Hex Offset	Hex Value	Level
DPGDCHAR	60		5
DPGDELFL	0	80	3
FSAB	30		3
FSSB	0		1

## FSSB - Structured datapage layout

Name	Hex Offset	Hex Value	Level
FSXB	4		3
RESCHAR	55		3
RESHALFW	2		3
SABOCCTK	30		5
SABOPRNR	38		5
SABOPRTK	30		4
SABRESRV	3A		4
SPBDATLT	56		2
SPBPRFX	0		2
SPBRBN	28		3
SPBTOTPG	2C		3
SSBCHARY	60		4
SSBDATA	60		3
SSBEXENR	5A		4
SSBPAGDT	58		2
SSBPAGNR	5E		4
SSBPARG	5C		4
SSBPRFX	58		3
SSBSTRTY	58		4
SXBDAY	12		5
SXBDSID	24		4
SXBJOBDT	C		4
SXJOBID	1C		4
SXJOBNM	4		4
SXJOBTM	14		4
SXBMONTH	10		5
SXBYEAR	C		5

## ID - Tracker identification record

Name : DCLID

Function:

This segment maps the identification data sent to the controller from a tracker system. The id event serves 4 purposes:

- acts as 'logon' data for tracker systems.
- propagates execution critical data (configuration) of the trk to con.
- reports on loss or activation of function in the tracker system.
- can perform pulse processing.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	50	ID	ID EVENT - MAX 50 BYTES
0	(0)	CHARACTER	2	IDEYE	EYE CATCHER FOR ID
2	(2)	CHARACTER	2	IDVER	VERSION NUMBER OF ID EVENT
4	(4)	CHARACTER	8	IDFMID	FMID OR ACRONYM
12	(C)	CHARACTER	2	IDLEVEL	SERVICE LEVEL
14	(E)	CHARACTER	2	IDTYPE	TYPE OF ID EVENT WHEN SENT
16	(10)	CHARACTER	16	IDSYS	OPERATING SYSTEM
16	(10)	CHARACTER	8	IDSYSNAME	NAME OF OPSYS FROM ..ID EVENT CONSTANTS

## ID - Tracker identification record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
24	(18)	CHARACTER	8	IDSYSLEV	THE LEVEL OF OP SYS   BLANK ..FROM CVTPRODN FOR MVS
32	(20)	UNSIGNED	4	IDLOG	UNDOCUMENTED AREA
36	(24)	BITSTRING	2	IDBITS	SOME FLAGS
				IDASCII	ON: THIS IS AN ASCII SYS
				IDINIT	ON: SENT BY TRK START
				IDCONCON	ON: ID CONFIRMED BY CON
				IDTRKCON	ON: ID CONFIRMED BY TRK
				IDTRKDEAD	ON: TRACKER PULSE LOST
				IDDEADMSG	ON: CARDIAC ARREST MSG DONE
				IDTRKPULSE	ON: ID PULSED BY TRACKER OFF: RETURNED BY CONTROLLER
				IDCONPULSE	ON: ID PULSED BY CONTROLLER OFF: RETURNED BY TRACKER
37	(25)	BITSTRING	1	UNKNOWNV1	BITS NOT IN V1 MAP
				IDGSS	2 3RD PART AUTH FLAG
				IDUNICODE	2 DATA IN UNICODE
				UNKNOWNV2	2 NOT IN V2 MAP
38	(26)	CHARACTER	8	IDDEST	DESTINATION NAME (ROUTEPTS)
46	(2E)	SIGNED	2	IDCASTNUM	DTB NUMBER FROM CONTROLLER
48	(30)	SIGNED	2	IDPULSIVL	PULSE RATE (IN MINUTES)
50	(32)	CHARACTER		IDEND_LABEL	FIXED AREA END LABEL

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	2	IDALIGN	ALIGN AREA
0	(0)	CHARACTER	2	*	ALIGN 2 BYTES
2	(2)	CHARACTER		IDALIGN_END	END LABEL

ID - MVS TRACKER DATA AREA BASE ON IDEND\_LABEL WHEN USED FROM MCA.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	100	IDMVS	MVS TRACKER ID DATA
0	(0)	CHARACTER	16	IDMESYS	JOB ENTRY SUBSYSTEM
0	(0)	CHARACTER	8	IDMEFMID	FMID OF THE JESX
8	(8)	CHARACTER	1	IDMEID	..FROM <SSXJES>, A/B
9	(9)	CHARACTER	1	IDMETYPEJ3	..JES3: G OR L
10	(A)	CHARACTER	6	*	RESERVED
16	(10)	CHARACTER	8	IDMNODE	TRACKER'S NJE NODE NAME
24	(18)	CHARACTER	4	IDMSYSID	SMF ID OF THIS SYSTEM
BELOW FLAGS TO BE SET BY EACH FUNCTION/SUBTASK WHEN INITIALIZED AND RUNNING. THE ID EVENT SHOULD THEN BE QUEUED TO EW.					
28	(1C)	BITSTRING	4	IDMFUNC	FUNCTIONS IN TRK
28	(1C)	BITSTRING	1	IDMTASK	- STARTED TASKS (1)
				IDMJCC	ON: JCC ACTIVE
				IDMRODM	ON: RODM TASK ACTIVE
				IDMSUBM	ON: SUBMITTOR ACTIVE
				*	RESERVED
29	(1D)	BITSTRING	1	*	CATM FUNCTION BITS
30	(1E)	BITSTRING	1	IDMTRACK	SOME JOB TRACKING
				IDMSTEPALL	ON: STEPEVENTS(ALL)

## ID - Tracker identification record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				IDMSTEPNZERO	ON: STEPEVENTS(NZERO)
				IDMJOBHOLD	ON: HOLD ALL JOBS
				IDMJOBUHOLD	ON: HOLDJOB(USER)
				*	RESERVED
31	(1F)	BITSTRING	1	IDMF4	RESERVED
31	(1F)	BITSTRING	1	*	RESERVED
32	(20)	BITSTRING	4	IDMFUNC2	RESERVED: MORE FUNCTION BITS
36	(24)	CHARACTER	32	IDMDATA	FUNCTION DATA
36	(24)	CHARACTER	4	IDMSUBS	NAME OF TRACKER SUBSYSTEM
40	(28)	CHARACTER	1	IDMEWRET	RETCODE(HIGH   LAST)
41	(29)	CHARACTER	1	IDMPTREV	PRINTEVENTS(NO   ALL   END)
68	(44)	CHARACTER	32	IDMDATA2	SECOND DATA PORTION
68	(44)	CHARACTER	8	IDCONSTAMP	TIME IN GMT BIN..
68	(44)	CHARACTER	4	IDCONDATE	DATE OF CONTROLLER CONFIRM
72	(48)	CHARACTER	4	IDCONTIME	TIME OF ...
100	(64)	CHARACTER		IDMVS_END01	LABEL FOR V01 END ADDRESS

### ID - AIX TRACKER DATA AREA

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	IDAIX	AIX TRACKER ID DATA
0	(0)	CHARACTER	32	IDAIP	IP ADDRESS OF JOBSUB SERVER
32	(20)	UNSIGNED	4	IDAPORT	..AND PORT NUMBER OF IT
36	(24)	CHARACTER	8	IDACODEPAGE	CONTROLLER CODE PAGE
FUNCTION FLAGS AND OPTIONS					
44	(2C)	BITSTRING	4	IDAFUNC	FUNCTIONS ACTIVE IN TRK
44	(2C)	BITSTRING	1	IDAF1	
				IDAAPILL	ON: LOADLEV API ACTIVE
				IDANOJOBLOG	ON: NO JOBLOG SUPPORT
				IDAJOBLOGIMD	ON: JOBLOG IMMED
				IDAEMV	2 ON: EVM ACTIVE
				*	RESERVED
45	(2D)	BITSTRING	1	IDAF2	RESERVED
45	(2D)	BITSTRING	1	*	
46	(2E)	BITSTRING	1	IDAF3	RESERVED
46	(2E)	BITSTRING	1	*	
47	(2F)	BITSTRING	1	IDAF4	RESERVED
47	(2F)	BITSTRING	1	*	
48	(30)	SIGNED	4	IDANUMSUB	NUMBER OF SUBMITTOR PROCS
52	(34)	CHARACTER	8	IDALLLEVEL	2 LOADLEVELER LEVEL   BLNK
60	(3C)	CHARACTER	8	IDAGSSLEVEL	2 GSS-API LEVEL   BLNK
68	(44)	CHARACTER	12	*	RESERVED
80	(50)	CHARACTER		IDAIX_END01	LABEL FOR V02 END ADDRESS

### ID - OS/400® TRACKER DATA AREA

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	68	ID400	OS/400 TRACKER ID DATA

## ID - Tracker identification record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	BITSTRING	4	ID4FUNC	FUNCTIONS ACTIVE IN TRK
4	(4)	CHARACTER	64	ID4	...<TOBEDETERMINED>
68	(44)	CHARACTER		ID400_END01	LABEL FOR V01 END ADDRESS

||XWA- ID - OS/2 AND WIN NT TRACKER DATA AREA (WORKGROUPS)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	76	IDAWG	AIX TRACKER ID DATA
0	(0)	CHARACTER	32	IDWIP	IP ADDRESS OF TRACKER
32	(20)	UNSIGNED	4	IDWPORT	..AND PORT NUMBER
36	(24)	CHARACTER	8	IDWCODEPAGE	CONTROLLER CODE PAGE
44	(2C)	CHARACTER	32	IDWGF	RESERVED

ID - FUNCTION LOSS DATA AREA NOTE: ALL FLOSSTYPE BITS SHOULD SET 'OFF' FOR MVS SUBTASK FAILURE/STOP.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	48	IDFROST	FUNCTION ARE LOST
0	(0)	CHARACTER	16	IDFLOSS	NAME OF (FROM STBNAME)
16	(10)	BITSTRING	4	IDFLOSSTYPE	2 FUNCTION LOSS TYPE
				IDCODEPAGE	2 ON: CODEPAGE IN IDFLOSS 2 USED INSTEAD ON CON 2 REQUESTED CODEPAGE
				IDNOPULSE	2 ON: CANNOT DO PULSE PROC 2 IDFLOSS = 'PULSE'
20	(14)	CHARACTER	28	*	RESERVED
48	(30)	CHARACTER		IDFL_END01	LABEL FOR V01 END ADDRESS

## Cross reference

Name	Hex Offset	Hex Value	Level
ID	0		1
IDAAPILL	2C	80	4
IDACODEPAGE	24		2
IDAEVM	2C	10	4
IDAFUNC	2C		2
IDAF1	2C		3
IDAF2	2D		3
IDAF3	2E		3
IDAF4	2F		3
IDAGSSLEVEL	3C		2
IDAIP	0		2
IDAIX	0		1
IDAIX_END01	50		2
IDAJOBLOGIMD	2C	20	4
IDALIGN	0		1
IDALIGN_END	2		2
IDALLEVEL	34		2
IDANOJOBLOG	2C	40	4
IDANUMSUB	30		2

## ID - Tracker identification record

Name	Hex Offset	Hex Value	Level
IDAPORT	20		2
IDASCII	24	80	3
IDAWG	0		1
IDBITS	24		2
IDCASTNUM	2E		2
IDCODEPAGE	10	80	3
IDCONCON	24	20	3
IDCONDATE	44		4
IDCONPULSE	24	01	3
IDCONSTAMP	44		3
IDCONTIME	48		4
IDDEADMSG	24	04	3
IDDEST	26		2
IDEND_LABEL	32		2
IDEYE	0		2
IDFL_END01	30		2
IDFLOSS	0		2
IDFLOSSTYPE	10		2
IDFMID	4		2
IDFROST	0		1
IDGSS	25	80	4
IDINIT	24	40	3
IDLEVEL	C		2
IDLOG	20		2
IDMDATA	24		2
IDMDATA2	44		2
IDMEFMID	0		3
IDMEID	8		3
IDMESYS	0		2
IDMETYPEJ3	9		3
IDMEWRETC	28		3
IDMFUNC	1C		2
IDMFUNC2	20		2
IDMF4	1F		3
IDMJCC	1C	80	4
IDMJOBHOLD	1E	20	4
IDMJOBHOLD	1E	10	4
IDMNODE	10		2
IDMPREV	29		3
IDMRODM	1C	20	4
IDMSTEPALL	1E	80	4
IDMSTEPNZERO	1E	40	4
IDMSUBM	1C	10	4
IDMSUBS	24		3
IDMSYSID	18		2
IDMTASK	1C		3
IDMTRACK	1E		3
IDMVS	0		1
IDMVS_END01	64		2
IDNOPULSE	10	40	3
IDPULSIVL	30		2



## ID - Tracker identification record

Name	Hex Offset	Hex Value	Level
IDSYS	10		2
IDSYSLEV	18		3
IDSYSNAME	10		3
IDTRKCON	24	10	3
IDTRKDEAD	24	08	3
IDTRKPULSE	24	02	3
IDTYPE	E		2
IDUNICODE	25	40	4
IDVER	2		2
IDWCODEPAGE	24		2
IDWGF	2C		2
IDWIP	0		2
IDWPORT	20		2
ID4	4		2
ID4FUNC	0		2
ID400	0		1
ID400_END01	44		2
UNKNOWNV1	25		3
UNKNOWNV2	25	3F	4

## JCLREC - Common data of JCL record

Name : DCLJCL

Function:

This segment declares a JCL record in the JCL repository, physically located in EQQJS1DS and EQQJS2DS.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	JCLREC	
0	(0)	CHARACTER	80	JCLBDY	FIXED PART OF JCL RECORD
0	(0)	CHARACTER	28	JCLKEY	
0	(0)	CHARACTER	16	JCLADID	APPLICATION NAME
16	(10)	CHARACTER	10	JCLIA	OCC INPUT ARRIVAL DATE+TIME
16	(10)	CHARACTER	6	JCLIAT1	DATE
22	(16)	CHARACTER	4	JCLIAT2	TIME
26	(1A)	SIGNED	2	JCLOPNUM	OPERATION NUMBER
28	(1C)	CHARACTER	4	JCLEYE	EYE CATCHER
32	(20)	UNSIGNED	1	JCLVERS	VERSION NUMBER
33	(21)	CHARACTER	1	*	FREE
34	(22)	CHARACTER	8	JCLJOBNM	JOBNAME
42	(2A)	CHARACTER	4	JCLWSN	WORK STATION NAME
46	(2E)	CHARACTER	10	JCLUPDAT	LAST UPDATE, DATE+TIME
46	(2E)	CHARACTER	6	JCLUPDT1	DATE
52	(34)	CHARACTER	4	JCLUPDT2	TIME
56	(38)	CHARACTER	8	JCLUSER	LAST UPDATE, USERID
64	(40)	CHARACTER	1	JCLUPTYP	UPDATING FUNCTION: L: LTP W: WSD R: READY LIST M: MCP
65	(41)	CHARACTER	1	JCLSTAT	OP. STATUS: S:SUB:ED V:SAVED T:TSAVED
66	(42)	UNSIGNED	2	JCLLINES	NO OF LINES IN RECORD

## JCLREC - Common data of JCL record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
68	(44)	CHARACTER	1	JCLFLAGS	FLAGBYTE
				JCLJSFND	ON = JCL READ FROM JS
				JCLELITD	ONCE BEEN EDITED
				*	NOT USED
69	(45)	CHARACTER	1	*	FREE
70	(46)	SIGNED	2	JCLVLINE	NUMBER OF VARIABLES
72	(48)	SIGNED	4	JCLSUBP	SUBPOOL FOR FREEMAIN
76	(4C)	CHARACTER	4	*	FREE
80	(50)	CHARACTER	80	JCLTAB (*)	JCL RECORDS
80	(50)	CHARACTER	72	JCLTEXT	COL 1-72 OF THE JCL RECORD
152	(98)	CHARACTER	8	JCLLNNO	COL 73-80 OF THE JCL RECORD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	JCLVTAB (*)	
0	(0)	CHARACTER	80	JCLV	
0	(0)	CHARACTER	8	JCLVNAME	VARIABLE NAME
8	(8)	CHARACTER	16	JCLVTNAM	VARIABLE TABLE NAME
24	(18)	CHARACTER	1	JCLVTYPE	P = PROMPT, Y= SETUP,N=SUB
25	(19)	CHARACTER	1	JCLVSET	E(XIT),D(EFAULT),P(REP),VAR
26	(1A)	CHARACTER	8	JCLVUSER	USER ID
26	(1A)	CHARACTER	8	JCLVEXIT	EXIT NAME
26	(1A)	CHARACTER	8	JCLVSNAM	SETTING VARIABLE NAME
34	(22)	CHARACTER	44	JCLVVAL	VARIABLE VALUE SET
78	(4E)	SIGNED	2	JCLVLGT	LENGTH OF VALUE

## Cross reference

Name	Hex Offset	Hex Value	Level
JCLADID	0		4
JCLBDY	0		2
JCLELITD	44	40	4
JCLEYE	1C		3
JCLFLAGS	44		3
JCLIA	10		4
JCLIAT1	10		5
JCLIAT2	16		5
JCLJOBNM	22		3
JCLJSFND	44	80	4
JCLKEY	0		3
JCLLINES	42		3
JCLLNNO	98		3
JCLOPNUM	1A		4
JCLREC	0		1
JCLSTAT	41		3
JCLSUBP	48		3
JCLTAB	50		2
JCLTEXT	50		3
JCLUPDAT	2E		3
JCLUPDT1	2E		4
JCLUPDT2	34		4

## JCLREC - Common data of JCL record

Name	Hex Offset	Hex Value	Level
JCLUPTYP	40		3
JCLUSER	38		3
JCLV	0		2
JCLVERS	20		3
JCLVEXIT	1A		4
JCLVLGT	4E		3
JCLVLINE	46		3
JCLVNAME	0		3
JCLVSET	19		3
JCLVSNAM	1A		5
JCLVTAB	0		1
JCLVTNAM	8		3
JCLVTYPE	18		3
JCLVUSER	1A		3
JCLVVAL	22		3
JCLWSN	2A		3

## JSLOG - Job-log record in EQQJSXDS

Name : DCLJSLOG

Function:

This segment declares the sysout passed to a controller from jcc subtask, as it is stored in the JS data set. If more than one record is required to store the information, a subsequent record is created, and a flag is set in the forgoing record.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	147	JSLOG	
0	(0)	CHARACTER	28	JSLOGKEY	KEY OF RECORD IN JS
0	(0)	CHARACTER	2	JSTYPE	TYPE (=14)
2	(2)	CHARACTER	16	JSLOGAID	APPLICATION ID
18	(12)	CHARACTER	8	JSLOGIA	OCCURRENCE INPUT ARRIVAL
18	(12)	SIGNED	4	JSLOGIADF	TREATED AS BINARY
18	(12)	CHARACTER	4	JSLOGIAD	IA DATE IN BINARY
22	(16)	SIGNED	4	JSLOGIATF	TREATED AS BINARY
22	(16)	CHARACTER	4	JSLOGIAT	IA TIME IN BINARY
26	(1A)	UNSIGNED	1	JSLOGOPN	OPERATION NUMBER
27	(1B)	UNSIGNED	1	JSLOGSEQ	SEQUENCE #, 1 REC = 01
28	(1C)	CHARACTER	1	JSLOGMORE	IF MORE RECORD FOR OPER = Y
29	(1D)	CHARACTER	2	JSLOGVERS	RECORD VERSION
31	(1F)	CHARACTER	1	*	NOT USED
32	(20)	SIGNED	4	JSLOGSZ	SIZE OF RECORD
36	(24)	CHARACTER	111	JSLOG14REC	COPY OF CP14 HEADER INFO
36	(24)	CHARACTER	8	JSLOG14KEY	COPY OF CP14 KEY AREA
44	(2C)	CHARACTER	85	JSLOG14BDY	COPY OF CP14 BODY +4
129	(81)	CHARACTER	2	*	STATUS
131	(83)	CHARACTER	16	JSLOGST	STATUS
147	(93)	CHARACTER		JSLOGDATA	DATA PORTION (COMPRESSED)

## Cross reference

Name	Hex Offset	Hex Value	Level
JSLOG	0		1
JSLOGAID	2		3
JSLOGDATA	93		2
JSLOGIA	12		3
JSLOGIAD	12		5
JSLOGIADF	12		4
JSLOGIAT	16		5
JSLOGIATF	16		4
JSLOGKEY	0		2
JSLOGMORE	1C		2
JSLOGOPN	1A		3
JSLOGSEQ	1B		3
JSLOGST	83		3
JSLOGSZ	20		2
JSLOGVERS	1D		2
JSLOG14BDY	2C		3
JSLOG14KEY	24		3
JSLOG14REC	24		2
JSTYPE	0		3

## JV - JCL variable table

Name : DCLJV

Function:

This segment defines the layout of a JCL variable table, in the JV logical file, physically located in EQQADDS

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	JV	JCL VARIABLE TABLE
0	(0)	CHARACTER	98	JVCOMMON	IDENTIFIER
0	(0)	CHARACTER	2	*	RESERVED FOR VSAM MODS/02
2	(2)	CHARACTER	23	JVKEY	KEY OF RECORD TABLE
2	(2)	CHARACTER	16	JVTABLE	JCL VARIABLE TABLE ID
18	(12)	CHARACTER	7	*	ALWAYS BLANK
25	(19)	CHARACTER	1	*	NOT USED
26	(1A)	CHARACTER	8	JVLU	LAST UPDATING USER
34	(22)	CHARACTER	4	JVLT	LAST UPDATE TIME HHMM
38	(26)	CHARACTER	6	JVLD	LAST UPDATE DATE YYMMDD
44	(2C)	CHARACTER	24	JVDES	TABLE DESCRIPTION
68	(44)	SIGNED	2	JV#VAR	NUMBER OF VARS IN TABLE
70	(46)	CHARACTER	16	JVOWN	OWNER ID
86	(56)	CHARACTER	2	*	NOT USED
88	(58)	CHARACTER	8	JVLUTS	LAST UPDATE TIMESTAMP
96	(60)	CHARACTER	2	*	NOT USED
98	(62)	CHARACTER	*	JVARSECT	VARIABLE PART OF TABLE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	476	JVTAB	JCL VAR TABLE, VAR PART
0	(0)	CHARACTER	8	JVVAR	JCL VARIABLE NAME
8	(8)	CHARACTER	44	JVDFL	JCL VARIABLE DEF VALUE
52	(34)	CHARACTER	1	JVUC	Y = UPPERCASE, N=MIXED
53	(35)	CHARACTER	1	JVSTP	PROMPT / SETUP / SUBMIT
54	(36)	SIGNED	2	JVLG	VALUE LENGTH
56	(38)	CHARACTER	7	JVTYP	VERIFICATION TYPE
63	(3F)	CHARACTER	8	JVEX	SUBSTITUTION EXIT NAME
71	(47)	CHARACTER	1	JVINP	INPUT REQUIRED
72	(48)	SIGNED	2	JVPOS	REPLACE POSITION JCL DATA
74	(4A)	CHARACTER	1	JVNUM	NUMERIC
75	(4B)	CHARACTER	2	JVCMP	COMPARISON OPERATOR
77	(4D)	CHARACTER	44	JVPAT	VALIDATION PATTERN
121	(79)	CHARACTER	102	JVVLD	VALID VALUES
121	(79)	CHARACTER	51	JVVLD1	FIRST LINE
172	(AC)	CHARACTER	51	JVVLD2	SECOND LINE
223	(DF)	CHARACTER	204	JVTXT	DIALOG TEXT
427	(1AB)	CHARACTER	20	JVTDES	DESCRIPTION
447	(1BF)	CHARACTER	1	*	RESERVED
448	(1C0)	SIGNED	2	JVNRP	NUMBER OF DEP VALUES
450	(1C2)	CHARACTER	8	JVIND	INDEPENDENT VARIABLE NAME
458	(1CA)	CHARACTER	2	JVVERS	VERSION NUMBER
460	(1CC)	CHARACTER	2	JVSUBS	SUBSTRING START POSITION
462	(1CE)	CHARACTER	2	JVSUBL	SUBSTRING LENGTH
464	(1D0)	CHARACTER	12	*	RESERVED

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	88	JVD	DEPENDENCIES
0	(0)	CHARACTER	44	JVDIV	VALUE OF SETTING VARIABLE
44	(2C)	CHARACTER	44	JVDDV	DEPENDENT VARIABLE VALUE

## Cross reference

Name	Hex Offset	Hex Value	Level
JV	0		1
JV#VAR	44		3
JVARSECT	62		2
JVCMP	4B		2
JVCOMMON	0		2
JVD	0		1
JVDDV	2C		2
JVDES	2C		3
JVDFL	8		2
JVDIV	0		2
JVEX	3F		2
JVIND	1C2		2
JVINP	47		2
JVKEY	2		3
JVLD	26		3
JVLG	36		2

## JV - JCL variable table

Name	Hex Offset	Hex Value	Level
JVLT	22		3
JVLU	1A		3
JVLUTS	58		3
JVNRP	1C0		2
JVNUM	4A		2
JVOWN	46		3
JVPAT	4D		2
JVPOS	48		2
JVSTP	35		2
JVSUBL	1CE		2
JVSUBS	1CC		2
JVTAB	0		1
JVTABLE	2		4
JVTDES	1AB		2
JVTXT	DF		2
JVTYP	38		2
JVUC	34		2
JVVAR	0		2
JVVERS	1CA		2
JVVLD	79		2
JVVLD1	79		3
JVVLD2	AC		3

## LTP - Long-term plan

Name : DCLLTP

Function:

This is the long-term plan record layout. The main type is declared as LTP.

The second type of record is the header record.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	LTP	
0	(0)	CHARACTER	176	LTPDP	
0	(0)	CHARACTER	2	*	RESERVED BY I/O-ROUTINES
2	(2)	CHARACTER	26	LTPKEY	
2	(2)	CHARACTER	6	LTPRDAY	RUN DATE <===KEY
8	(8)	CHARACTER	16	LTPAID	APPLICATION NAME <===KEY
24	(18)	CHARACTER	4	LTPSTIME	INPUT ARRIVAL TIME<===KEY
28	(1C)	CHARACTER	4	LTPEYE	LTP EYE CATCHER
32	(20)	UNSIGNED	1	LTPVERS	LTP VERSION NUMBER
33	(21)	CHARACTER	8	LTPAUTH	AUTHORITY GROUP
41	(29)	CHARACTER	16	LTPOWNER	APPLICATION OWNER ID
57	(39)	CHARACTER	10	LTPORIA	ORIGINAL INPUT ARRIVAL
57	(39)	CHARACTER	6	LTPORDAY	ORIGINAL RUN DATE
63	(3F)	CHARACTER	4	LTPORTIM	ORIGINAL IA TIME
67	(43)	CHARACTER	10	LTPDEADL	OCCURRENCE DEADLINE
67	(43)	CHARACTER	6	LTPDDAY	DEADLINE DATE
73	(49)	CHARACTER	4	LTPDTIME	DEADLINE TIME
77	(4D)	CHARACTER	1	LTPPRT	PRIORITY
78	(4E)	CHARACTER	4	LTPERCOD	ERROR CODE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
82	(52)	CHARACTER	1	LTPADM LTPDEL LTPADD LTPMOD LTPMOV  LTPDEPCH  LTPCOMPL *	FLAGS SET BY ONLINE LTP MARKED 'DELETED' BY ONLINE ADDED BY ONLINE FUNCTION OCC. MODIFIED ONLINE RUNDATE/TIME MODIFIED=MOVE DEPENDENCY CHANGED MANUAL OCCURRENCE COMPLETED IN JT
83	(53)	CHARACTER	1	LTPFLGS LTPOPTRU LTPEXPRES *	MOVED DUE TO OPTIONAL RULE EXTERNAL PREDECESSOR FREE TO USE
84	(54)	SIGNED	4	LTP#PRED	NUMBER OF EXTERNAL PREDS
88	(58)	SIGNED	4	LTP#SUCC	NUMBER OF EXTERNAL SUCCS
92	(5C)	SIGNED	4	LTP#CHOP	NUMBER OF CHANGED OPS
96	(60)	CHARACTER	1	LTPDSTAT	RUNDAY STATUS
97	(61)	CHARACTER	16	LTPJVTAB	VARIABLE TABLE NAME
113	(71)	CHARACTER	1	*	FREE
114	(72)	CHARACTER	16	LTPGROUPID	GROUP APPLICATION ID
130	(82)	CHARACTER	16	LTPCAL	CALENDAR NAME
146	(92)	CHARACTER	8	LTPLUTS	LAST UPDATE TIMESTAMP
154	(9A)	SIGNED	2	LTPRUNID	RUN CYCLE ID
156	(9C)	SIGNED	4	LTP#CONDPRED	NUMBER OF EXTERNAL COND. PREDS
160	(A0)	SIGNED	4	LTP#CONDSUCC	NUMBER OF EXTERNAL COND. SUCCS
164	(A4)	CHARACTER	12	LTPFILLER	FREE
176	(B0)	CHARACTER	*	LTPVARS	VARIABLE SECTION

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
160	(A0)	STRUCTURE	*	LTPPREDS	THE PREDECESSOR SECTIONS
160	(A0)	CHARACTER	35	LTPPRED (*)	
160	(A0)	CHARACTER	27	LTPPREDI	PREDECESSOR ID PART
160	(A0)	CHARACTER	26	LTPPRID	PREDECESSOR KEY PART
160	(A0)	CHARACTER	6	LTPPRDAY	RUN DATE
166	(A6)	CHARACTER	16	LTPPAID	APPLICATION NAME
182	(B6)	CHARACTER	4	LTPPIAT	INPUT ARRIVAL TIME
186	(BA)	CHARACTER	1	LTPPFLGS LTPPDEL LTPPAD  LTPPDONE *	PRED DEPENDENCY FLAGS DEPENDENCY DELETED DEPENDENCY MANUALLY ADDED PREDECESSOR HAS COMPLETED FREE TO USE
187	(BB)	CHARACTER	8	*	FREE TO USE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	LTPSUCCS	
0	(0)	CHARACTER	35	LTPSUCC (*)	A SUCCESSOR SECTION
0	(0)	CHARACTER	27	LTPSUCCI	SUCCESSOR ID PART

## LTP - Long-term plan

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	26	LTPSUID	SUCCESSOR KEY PART
0	(0)	CHARACTER	6	LTPSRDAY	RUN DATE
6	(6)	CHARACTER	16	LTPSAID	APPLICATION NAME
22	(16)	CHARACTER	4	LTPSIAT	INPUT ARRIVAL TIME
26	(1A)	CHARACTER	1	LTPSFLGS	SUCC DEPENDENCY FLAGS
				LTPSDEL	DEPENDENCY DELETED
				LTPSADD	DEPENDENCY MANUALLY ADDED
				*	FREE TO USE
27	(1B)	CHARACTER	8	*	FREE TO USE

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	* LTPCONDPREDS	
0	(0)	CHARACTER	35 LTPCONDPRED(*)	A CONDITIONAL PREDECESSOR SECTION
0	(0)	CHARACTER	27 LTPCONDPREDI	PREDECESSOR ID PART
0	(0)	CHARACTER	26 LTPCONDPRID	PREDECESSOR KEY PART
0	(0)	CHARACTER	6 LTPCONDPDAY	RUN DATE
6	(6)	CHARACTER	16 LTPCONDPDPAID	APPLICATION NAME
22	(16)	CHARACTER	4 LTPCONDPDIAT	INPUT ARRIVAL TIME
26	(1A)	CHARACTER	1 LTPCONDPFLGS	PRED DEPENDENCY FLAGS
		1... ....	LTPCONDPDEL	DEPENDENCY DELETED
		.1.. ....	LTPCONDPADD	DEPENDENCY ADDED
		..1. ....	LTPCONDPDONE	PRED HAS COMPLETED
		...1 1111	*	FREE TO USE
27	(1B)	CHARACTER	2 LTPCONDPEYE	EYE CATCHER 'PC'
29	(1D)	CHARACTER	6 *	FREE TO USE

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	* LTPCONDSUCCS	
0	(0)	CHARACTER	35 LTPCONDSUCC(*)	A CONDITIONAL SUCCESSOR SECTION
0	(0)	CHARACTER	27 LTPCONDSUCCI	SUCCESSOR ID PART
0	(0)	CHARACTER	26 LTPCONDSUID	SUCCESSOR KEY PART
0	(0)	CHARACTER	6 LTPCONDSRDAY	RUN DATE
6	(6)	CHARACTER	16 LTPCONDSAID	APPLICATION NAME
22	(16)	CHARACTER	4 LTPCONDSIAT	INPUT ARRIVAL TIME
26	(1A)	CHARACTER	1 LTPCONDSFLGS	SUCC DEPENDENCY FLAGS
		1... ....	LTPCONDSDEL	DEPENDENCY DELETED
		.1.. ....	LTPCONDSADD	DEPENDENCY ADDED
		..11 1111	*	FREE TO USE
27	(1B)	CHARACTER	2 LTPCONDSEYE	EYE CATCHER 'SC'
29	(1D)	CHARACTER	6 *	FREE TO USE

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	LTPCHOPS	
0	(0)	CHARACTER	58	LTPCHOP(*)	CHANGED OPERATION DATA
0	(0)	CHARACTER	6	LTPCHOID	OPERATION ID
0	(0)	CHARACTER	4	LTPCHWS	WORKSTATION NAME
4	(4)	SIGNED	2	LTPCHOIN	OPERATION NUMBER
6	(6)	CHARACTER	10	LTPCHIA	OP INPUT ARRIVAL
6	(6)	CHARACTER	6	LTPCHIAD	OP INPUT ARRIVAL DATE
12	(C)	CHARACTER	4	LTPCHIAT	OP INPUT ARRIVAL TIME
16	(10)	CHARACTER	10	LTPCHD	OP DEADLINE
16	(10)	CHARACTER	6	LTPCHDD	OP DEADLINE DATE
22	(16)	CHARACTER	4	LTPCHDT	OP DEADLINE TIME
26	(1A)	CHARACTER	24	LTPCHTXT	OP TEXT DESCRIPTION
50	(32)	CHARACTER	1	LTPSCR	CENTRALIZED SCRIPT
51	(33)	CHARACTER	7	*	FREE TO USE



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	92	LTPHEAD	HEADER RECORD
0	(0)	CHARACTER	2	*	RESERVED BY I/O-ROUTINES
2	(2)	CHARACTER	26	LTPHDKEY	LTP KEY <=== KEY EQUAL ' HEADER '
28	(1C)	CHARACTER	4	LTPHEYE	LTP EYE CATCHER
32	(20)	UNSIGNED	1	LTPHVERS	LTP VERSION NUMBER
33	(21)	CHARACTER	3	*	FREE TO USE
36	(24)	CHARACTER	6	LTPSDAY	LTP START DAY
42	(2A)	CHARACTER	6	LTPEDAY	LTP END DAY
48	(30)	CHARACTER	6	LTPLUP	LATEST UPDATE
54	(36)	CHARACTER	6	LTPFNONC	DATE WITH FIRST NON COMPLETE OCCURRENCE
60	(3C)	CHARACTER	10	LTPPNEN	
60	(3C)	CHARACTER	6	LTPPNEND	PLAN NEXT PERIOD END DATE
66	(42)	CHARACTER	4	LTPPNENT	AND TIME
70	(46)	SIGNED	2	LTP#REPL	NUMBER OF REPLANS SINCE LAST PLAN NEXT
72	(48)	BITSTRING	1	LTPHFLGS	HEADER FLAGS
				LTPBUILD	LTP BUILD IS COMPLETE
				*	FREE TO USE
				LTPOIA	ALL DAYS IN OP IA
				LTPODA	ALL DAYS IN OP DL
73	(49)	CHARACTER	3	*	FREE TO USE
76	(4C)	SIGNED	4	LTPMAXSZ	(DIALOG) MAX LT SIZE
80	(50)	CHARACTER	10	LTPLEVEL	LEVEL OF LT PLAN DS
80	(50)	CHARACTER	2	LTPLEV_VER	VERSION OF LT PLAN DS
82	(52)	CHARACTER	8	LTPLEV_FMID	FMID OF LT PLAN DS
90	(5A)	CHARACTER	2	*	FREE TO USE

### Cross reference

HEX NAME	HEX	OFFSET	VALUE	LEVEL
LTP		0		1
LTP#CHOP		5C		3
LTP#CONDPRED		9C		3
LTP#CONDSUCC		A0		3
LTP#PRED		54		3
LTP#REPL		46		2
LTP#SUCC		58		3
LTPADD		52	40	4
LTPADM		52		3
LTPAID		8		4
LTPAUTH		21		3
LTPBUILD		48	80	3
LTPCAL		82		3
LTPCHD		10		3
LTPCHDD		10		4
LTPCHDT		16		4
LTPCHIA		6		3
LTPCHIAD		6		4
LTPCHIAT		C		4
LTPCHOID		0		3
LTPCHOIN		4		4
LTPCHOP		0		2
LTPCHOPS		0		1
LTPCHTXT		1A		3

## LTP - Long-term plan

LTPCHWS	0		4
LTPCOMPL	52	04	4
LTPCONDPADD	1A	40	5
LTPCONDPAID	6		5
LTPCONDPDEL	1A	80	5
LTPCONDPDONE	1A	20	5
LTPCONDPEYE	1B		3
LTPCONDPFLGS	1A		4
LTPCONDPIAT	16		5
LTPCONDPDAY	0		5
LTPCONDPRED	0		2
LTPCONDPREDI	0		3
LTPCONDPREDS	0		1
LTPCONDPRID	0		4
LTPCONDSADD	1A	40	5
LTPCONDSAID	6		5
LTPCONSDDEL	1A	80	5
LTPCONDSEYE	1B		3
LTPCONDSFLGS	1A		4
LTPCONDSIAT	16		5
LTPCONDSRDAY	0		5
LTPCONDSUCC	0		2
LTPCONDSUCCI	0		3
LTPCONDSUCCS	0		1
LTPCONDSUID	0		4
LTPDDAY	43		4
LTPDEADL	43		3
LTPDEL	52	80	4
LTPDEPCH	52	08	4
LTPDP	0		2
LTPDSTAT	60		3
LTPDTIME	49		4
LTPEDAY	2A		2
LTPERCOD	4E		3
LTPEXPR	53	40	4
LTPEYE	1C		3
LTPFILLER	A4		3
LTPFLGS	53		3
LTPFNONC	36		2
LTPGROUPID	72		3
LTPHDKEY	2		2
LTPHEAD	0		1
LTPHEYE	1C		2
LTPHFLGS	48		2
LTPHVERS	20		2
LTPJV TAB	61		3
LTPKEY	2		3
LTPLEV_FMID	52		3
LTPLEV_VER	50		3
LTPLEVĒL	50		2
LTPLUP	30		2
LTPLUTS	92		3
LTPMAXSZ	4C		2
LTPMOD	52	20	4
LTPMOV	52	10	4
LTPODA	48	01	3
LTPOIA	48	02	3
LTPOPTRU	53	80	4
LTPORDAY	39		4
LTPORIA	39		3
LTPORTIM	3F		4
LTPOWNER	29		3
LTPPADD	CA	40	5
LTPPAID	B6		5
LTPPDEL	CA	80	5
LTPPDONE	CA	20	5
LTPPEYE	CB		3

LTPPFLGS	CA		4
LTPPIAT	C6		5
LTPPNEN	3C		2
LTPPNEND	3C		3
LTPPNENT	42		3
LTPPRDAY	B0		5
LTPPPRED	B0		2
LTPPPREDI	B0		3
LTPPPREDS	B0		1
LTPPRID	B0		4
LTPPRT	4D		3
LTPRDAY	2		4
LTPRUNID	9A		3
LTPSADD	1A	40	5
LTPSAID	6		5
LTPSCR	32		3
LTPSDAY	24		2
LTPSDEL	1A	80	5
LTPSEYE	1B		3
LTPSFLGS	1A		4
LTPSIAT	16		5
LTPSRDAY	0		5
LTPSTIME	18		4
LTPSUCC	0		2
LTPSUCCI	0		3
LTPSUCCS	0		1
LTPSUID	0		4
LTPVARS	B0		2
LTPVERS	20		3

---

## MCA - Main communication area

Name : DCLMCA

Function:

This segment declares the scheduler common area. Most control blocks can be reached via the MCA.

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	384	MCA	SCHEDULER COMMUNICATION AREA
0	(0)	CHARACTER	4	MCADESC	BLOCK DESCRIPTOR = 'MCA '
4	(4)	CHARACTER	10	MCALEVEL	MCA BLOCK CODE LEVEL
4	(4)	CHARACTER	2	MCAVER	BLOCK MAPPING VERSION
6	(6)	CHARACTER	8	MCAFMID	TRACKER FMID
14	(E)	BITSTRING	2	MCAFLAGS	MCA OPTIONS
				MCATSO	1: TSO USER BUILT MCA
				MCAASXB	1: ASXB WAS MODIFIED
				MCAACEE	1: ACEE BUILT
				MCARACF	1: SUBRES PROFILES
				MCAESA	1: ACTIVE ON MVS/ESA
				MCASP4	1: MVS/SP 4.1 OR LATER
				MCAMLOG	1: MSG LOG IS RESERVED
				MCA313	1: MVS/SP 3.1.3 OR LATER
15	(F)			MCAQFCAN	1: SS CANCLD DUE TO QFULL
				MCANOPRM	1: DO NOT OPEN PARMLIB
				MCAEDPW	1: WAITING FOR EDP
				MCASP422	1: MVS/SP 4.2.2 OR LATER
				MCAPACE	1: EVENT INFLOW PACED

## MCA - Main communication area

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				MCAUPACE	1: EMGR ASK FOR RESUME
				MCARTRQ	1: QUEUE TO DRTQ
				MCATCPR	1: TA TASK RESTARTING
CONTROL BLOCK ADDRESSES FOLLOW					
16	(10)	ADDRESS	4	MCAASCB	EQQMAJOR ASCB ADDRESS
20	(14)	ADDRESS	4	MCAMTCB	EQQMAJOR TCB ADDRESS
24	(18)	ADDRESS	4	MCAOPTS	ADDR OF OPTIONS BLOCK
28	(1C)	ADDRESS	4	MCAFTAB	FILE TABLE ADDRESS
32	(20)	ADDRESS	4	MCSTEMJ	ADDR 1ST MAJOR SUBTASK
36	(24)	ADDRESS	4	MCSTEMN	ADDR 1ST NMM SUBTASK
40	(28)	ADDRESS	4	MCASTEGS	ADDR 1ST GENSERV SUBTASK
44	(2C)	ADDRESS	4	MCAOPECB	ADDR OF OPER CMD ECB
48	(30)	ADDRESS	4	MCASSVT	ADDR OF SSVT
52	(34)	ADDRESS	4	MCASSCT	ADDR OF SSCT
56	(38)	ADDRESS	4	MCATSOB	ADDR OF TSO TABLE BLOCK
60	(3C)	ADDRESS	4	MCANMMB	ADDR OF NMM PARAMETERS
64	(40)	ADDRESS	4	MCAEDPB	ADDR OF EDP BLOCK
68	(44)	ADDRESS	4	MCAPRIP	ADDR OF PRI BLOCK
72	(48)	ADDRESS	4	MCASRAP	ADDR OF SERV ROUTN ARRAY
76	(4C)	ADDRESS	4	MCASURE	ADDR OF SU/RE TABLE
80	(50)	ADDRESS	4	MCANABB	ADDR OF VTAM I/O PARAMS
84	(54)	ADDRESS	4	MCADIAP	ADDR OF DIAGNOSE OPTIONS
88	(58)	ADDRESS	4	MCACPNQ	ADDR OF CP ENQ STATISTICS
92	(5C)	ADDRESS	4	MCATMLOG	TCB ADDR OF MLOG RESERVER
96	(60)	ADDRESS	4	MCAJANCP	JS INTERFACE ANCHOR BLOCK
100	(64)	ADDRESS	4	MCAXSIP	XCF SYSTEM INFO CB
104	(68)	ADDRESS	4	MCAQFECB	ADDR TO Q FULL ECB
108	(6C)	ADDRESS	4	MCAASIP	APPC SYSTEM INFO CB
112	(70)	ADDRESS	4	MCAAREP	APPC RESTART ECB PTR
116	(74)	ADDRESS	4	MCATSRAP	ADDRESS OF TOPOLOGY PARSING
120	(78)	ADDRESS	4	MCAFSRAP	ADDRES OF DATA STORE SERVICE ROUTINES
124	(7C)	ADDRESS	4	MCASUB	ADDR OF SUB PARM AREA
128	(80)	ADDRESS	4	MCASSXP	SSX BLOCK ADDRESS
132	(84)	ADDRESS	4	MCARSIP	RODM SYSTEM INFO CB
136	(88)	ADDRESS	4	MCARREP	RODM RESTART ECB PTR
140	(8C)	ADDRESS	4	MCARODMOPT	RODM OPTIONS TABLE
144	(90)	ADDRESS	4	MCAHCM	HCMAN ADDRESS
148	(94)	ADDRESS	4	MCAID	LOCAL ID EVENT AREA
152	(98)	ADDRESS	4	MCAJOPTS	ADDRESS OF JOBOPTS PARMS
156	(9C)	ADDRESS	4	MCAANMMP	ALWAYS NMMPOINTER
160	(A0)	ADDRESS	4	MCAQUEPTR	CURRENT QUEUE ELEM PTR
SERVICE ROUTINE ADDRESSES FOLLOW					
164	(A4)	ADDRESS	4	MCAMSGX	MESSAGE ROUTINE ADDRESS
168	(A8)	ADDRESS	4	MCASEQX	SEQ I/O SERVICE ROUTINE
172	(AC)	ADDRESS	4	MCAPDSX	PDS I/O SERVICE ROUTINE
176	(B0)	ADDRESS	4	MCAPRMX	PARAM MEMBER PARSE RTN
180	(B4)	ADDRESS	4	MCAQUEX	QUEUE SERVER ROUTINE
184	(B8)	ADDRESS	4	MCANOWX	CURRENT TIME ROUTINE
188	(BC)	ADDRESS	4	MCAVSAM	ADDR VSAM FILE HANDLER
192	(C0)	ADDRESS	4	MCAVSAMB	ADDR BEX VSAM FILE HANDLER
196	(C4)	ADDRESS	4	MCASUBX	ADDR JOB SUBMIT ROUTINE
200	(C8)	ADDRESS	4	MCARELX	ADDR JOB RELEASE ROUTINE

## MCA - Main communication area

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
204	(CC)	ADDRESS	4	MCAEVHX	ADDR OF EVENT HANDLER
208	(D0)	ADDRESS	4	MCAMCPX	ADDR OF MODIFY CURR PLAN
212	(D4)	ADDRESS	4	MCABEXP	BEX SERVICES ADDRESS
216	(D8)	ADDRESS	4	MCAAIDX	ZNOWX FORMAT CLONE ADDRESS
220	(DC)	ADDRESS	4	MCALVCK	LEVEL CHECK ROUTINE ADRES
224	(E0)	ADDRESS	4	MCAZNQD	ZNQDX LOCK DSNAM
228	(E4)	ADDRESS	4	* (1)	RESERVED
232	(E8)	ADDRESS	4	MCAIDECB	EW ID EVENT ECB
MISCELLANEOUS CONSTANTS					
236	(EC)	SIGNED	2	MCANSUBS	NUMBER OF SUBSYS SUBTASKS
238	(EE)	SIGNED	2	MCAGMTOF	GMT OFFSET, MINUTES
240	(F0)	SIGNED	2	MCARACTRC	RACROUTE TRACE LEVEL
242	(F2)	BITSTRING	2	MCADSTORE	DATA STORE TASK STATUS
				DBAREADY	DATA BASE INIT OK
				DBAFAIL	DATA BASE ENDED
				JQUREADY	JES QUEUE INIT OK
				JQUFAIL	JES QUEUE ENDED
242	(F2)	BITSTRING	1	*	
243	(F3)			FPROCIN	
				FMETHOD	DATA STORE METHOD TRACE
				FPARSER	DATA STORE PARSER TRACE
244	(F4)	SIGNED	4	MCAGMTSEC	GMT OFFSET, SECONDS
248	(F8)	CHARACTER	1	MCAJES	PRIMARY JES, A=JS2, B=JS3
249	(F9)	CHARACTER	1	MCACJES	JES COMMAND 1ST CHARACTER
250	(FA)	CHARACTER	4	MCASSNM	SUBSYSTEM NAME
254	(FE)	CHARACTER	8	MCAMAJNM	MAJOR ENQ NAME
262	(106)	CHARACTER	8	MCACLASS	RACF RESOURCE CLASS NAME
270	(10E)	CHARACTER	8	MCANJENM	NJE NODE NAME
278	(116)	CHARACTER	4	MCAQFQN	NAME OF FULL QUEUE
282	(11A)	CHARACTER	8	MCANVID	NETVIEW RECEIVER ID
290	(122)	CHARACTER	1	MCADSCLAS	JES CLASS FOR DATASTORE
291	(123)	CHARACTER	1	MCASPIN	Y = SPIN AVAILABLE N = SPIN NOT AVAILABLE
292	(124)	ADDRESS	4	MCAPHBP	TO SERVER BLOCK
296	(128)	CHARACTER	5	MCACLJOB	CLEAN UP JOB NAME
301	(12D)	CHARACTER	1	MCADDRSPC	ADDRESS SPACE TYPE O = CONTROLLER/TRACKER S = SERVER D = DATA STORE B = BATCH
302	(12E)	CHARACTER	8	MCAJESFMID	JES FMID
310	(136)	CHARACTER	1	MCATRACES	
				MCAZZSPIN	SPIN TRACES
				*	
311	(137)	CHARACTER	1	MCALLOPT	LISTLOG OPTION A F N
312	(138)	BITSTRING	6	MCASUBRS	PROTECTED SUBRESOURCES
				MCAADNM	ADA.ADNAM IS A RESOURCE
				MCAADOW	ADO.OWNER IS A RESOURCE
				MCAADGR	ADG.GROUP IS A RESOURCE
				MCAADJB	ADJ.JOBNAME IS A RESOURCE
				MCACPAD	CPA.ADNAM IS A RESOURCE
				MCACPOW	CPO.OWNER IS A RESOURCE
				MCACPGR	CPG.GROUP IS A RESOURCE

## MCA - Main communication area

Offsets		Type	Len	Name (Dim)	Description				
Dec	Hex								
313	(139)			MCACPJB	CPJ.JOBNAME IS A RESOURCE				
				MCACPWS	CPW.WSNAME IS A RESOURCE				
				MCAJCAD	JSA.ADNAME IS A RESOURCE				
				MCAJCJB	JSJ.JOBNAME IS A RESOURCE				
				MCAJCWS	JSW.WSNAME IS A RESOURCE				
				MCAJCOW	JSO.OWNER IS A RESOURCE				
				MCAJCGR	JSG.GROUP IS A RESOURCE				
				MCALTAD	LTA.ADNAME IS A RESOURCE				
				MCALTOW	LTO.OWNER IS A RESOURCE				
				314	(13A)			MCAOIAD	OIA.ADNAME IS A RESOURCE
								MCAWSWS	WSW.WSNAME IS A RESOURCE
								MCARLAD	RLA.ADNAME IS A RESOURCE
								MCARLOW	RLO.OWNER IS A RESOURCE
								MCARLGR	RLG.GROUP IS A RESOURCE
MCARLWS	RLW.WSNAME IS A RESOURCE								
MCACLGN	CLC.CALNAME IS A RESOURCE								
315	(13B)			MCAPRPN	PRP.PERNAME IS A RESOURCE				
				MCAETNM	ETE.NAME IS A RESOURCE				
				MCAETAD	ETA.NAME IS A RESOURCE				
				MCASRNM	SRS.NAME IS A RESOURCE				
				MCAVJVO	JV.OWNER IS A RESOURCE				
				MCAVJVN	JV.TABNAME IS A RESOURCE				
				MCACPWO	CPZ.WSNAME IS A RES				
				MCACPGD	CPD.OCCGRP IS A RES				
				MCALTGD	LTD.OCCGRP IS A RES				
				316	(13C)			MCAADGD	ADD.ADGRP IS A RES
MCARLWST	RL.WSSTAT IS A RES								
MCARDRN	RDR.NAME IS A RES								
MCAADFX	ADE.EXTNAME IS A RES								
MCACPEX	CPE.EXTNAME IS A RES								
MCAADSE	AD.SECELEM IS A RES								
MCACPSE	CP.SECELEM IS A RES								
MCADBRP	RP.REPTYPE IS A RES								
317	(13D)							MCAADINUSE	AD USED BY BATCH
								MCAADVERRUN	AD VER DONE
								MCAPIF	
								MCAJLD	JL.DSNAME LIBRARY ACCESS
								MCAJLM	JL.MEMBER MEMBER ACCESS
				MCAADUF	AD.UFVAL ACCESS CONTROL				
				MCACPUF	CP.UFVAL ACCESS CONTROL				
				*					
318	(13E)	BITSTRING	2	MCAFLAGS2	FLAGS				
				MCASP52	1: MVS/SP 5.2 OR LATER				
				MCASYMB	1: PERFORM SYMBOL SUBST				
				MCAUX002	EXIT2 INVOKED				
				MCAWAENQ	DEQUEUE AFTER ABEND?				
				MCADBG	FOR DEBUG PURPOSE				
				*	FREE				
				MCATWSCNTLSTART	ON: AT STARTUP				
319	(13F)			MCABULKDISCOVERYRUN	BULK DISK IS ALREADY RUNNING				
				MCALOCK2B					
				MCACSTOPC	ON=STOP COMMAND ISSUE				

## MCA - Main communication area

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				MCARESTART	
				MCALOGRCOPEN	ON=LOGRC OPEN
				MCALOGRCEMPTY	ON=LOGRC EMPTY
				MCALOGRCUPEND	ON=UNLOAD PENDING
				MCALOGRCLDONE	ON=LOAD DONE
				*	FREE
320	(140)	ADDRESS	4	MCATPLGYP	TOPOLOGY CB ADDRESS
324	(144)	SIGNED	4	* (2)	RESERVED
332	(14C)	SIGNED	4	MCAUSERF	RESERVED FOR EXITS
336	(150)	SIGNED	2	MCAQUELEN	QUEUELEN CHANGED VALUE
338	(152)	BITSTRING	2	MCAPERF	PERFORMANCE FLAGS
				MCAEXIDB	EXIT DEBUG
				MCAJCLDB	JCL DEBUG
				MCAE105	E105 MSG FLAG
				MCAZ308	Z308 MSG FLAG
				MCAN069	N069 MSG FLAG
338	(152)	BITSTRING	1	*	FREE
340	(154)	SIGNED	2	MCATIMESTA	STATS MSG INTERVAL TIME
342	(156)	SIGNED	2	*	
344	(158)	ADDRESS	4	MCADBG	
348	(15C)	ADDRESS	4	MCAMLOGD	MLOG DSNAME ADDRESS
352	(160)	ADDRESS	4	MCAFARB	
356	(164)	SIGNED	4	LOCKRC	
360	(168)	CHARACTER	4	MCAFINDMEM	
360	(168)	BITSTRING	3	MCATTR	
363	(16B)	BITSTRING	1	MCACONC#	
364	(16C)	SIGNED	4	MCAENFTOK57	ENF REQUEST 57 DTOKEN
368	(170)	SIGNED	4	MCAWLMQSZ	WLM QUERY SIZE
372	(174)	SIGNED	4	MCAENFTOK41	ENF REQUEST 41 DTOKEN
376	(178)	ADDRESS	4	MCAMSGI	BUFMAG ROUTINE ADDRESS
380	(17C)	SIGNED	4	*	RESERVED
384	(180)	CHARACTER	48	*	FREE
432	(1B0)	CHARACTER			END OF MCA

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
0	(0)	STRUCTURE	324	MCAEXT	EXTENDED MCA
0	(0)	ADDRESS	4	MCAANCQP	ADDRESS OF MCAFLQUE
4	(4)	CHARACTER	8	MCASYSNAME	SYSNAME
12	(C)	ADDRESS	4	MCAJTAB	ADDRESS OF EQQZJTAB
16	(10)	ADDRESS	4	MCADSIOX	ADDRESS OF EQQDSIOX
20	(14)	ADDRESS	4	MCADSINI	ADDRESS OF EQQDSINI
24	(18)	ADDRESS	4	MCAJTBP	POINTER TO JTB
28	(1C)	ADDRESS	4	MCAX14TABP	EXIT14 TAB POINTER
32	(20)	SIGNED	4	MCAX14NUMR	EXIT14 NUMROW
36	(24)	SIGNED	4	MCAX14RSIZ	EXIT14 RECSIZE
40	(28)	ADDRESS	4	MCADSVIEWP	POINTER TO DSV COMMAND AREA
44	(2C)	CHARACTER	8	MCAOPTMEM	OPTIONS MEMBER
52	(34)	ADDRESS	4	MCADTBAUX	POINTER TO REFRESH DEST
56	(38)	SIGNED	4	MCAAVILDST	DESTINATION SLOTS AVAILABLE FOR REFRESH
60	(3C)	ADDRESS	4	MCAHTCA	POINTER TO HTCA

## MCA - Main communication area

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
64	(40)	SIGNED	4	MCAHTCAUXN	LENGHT OF AUX HTC
68	(44)	ADDRESS	4	MCAHTCAUX	POINTER TO AUXILIARY HTC
72	(48)	ADDRESS	4	MCAPERFJTBP	PERF MEASUREMENT JTBP
76	(4C)	ADDRESS	4	MCAAREAS	STORAGE FOR JEK/JNODES
80	(50)	ADDRESS	4	MCAJNOFR	FIRST FREE JNODE
84	(54)	ADDRESS	4	MCAJEKFR	FIRST FREE JEK ENTRY
88	(58)	ADDRESS	4	MCAJEKFP	FIRST JOB ENTRY ELEMENT
92	(5C)	ADDRESS	4	MCAJEKLP	LAST JOB ENTRY ELEMENT
96	(60)	ADDRESS	4	MCAJNOFP	ROOT JNODE
100	(64)	ADDRESS	4	MCAJNOFLP	FIRST LEAF JNODE
104	(68)	ADDRESS	4	MCAJNOLLP	LAST LEAF JNODE
108	(6C)	ADDRESS	4	MCAJEKLASTIP	LAST LEAF JNODE
112	(70)	SIGNED	2	MCAJEKLASTIPO	LAST RELATIVE JE POSITION
114	(72)	SIGNED	2	MCAJNODENO	NUMBER OF JNODES
116	(74)	SIGNED	4	MCAHTSAUXN	LENGHT OF AUX HTS
120	(78)	ADDRESS	4	MCAHTSAUX	POINTER TO AUXILIARY HTS
124	(7C)	ADDRESS	4	MCAHTSA	POINTER TO HTSA
128	(80)	ADDRESS	4	MCAZRTAB	ADDRESS OF EQZRTAB
132	(84)	ADDRESS	4	MCAZRXCMB	ADDRESS OF EQZRXCMB
136	(88)	ADDRESS	4	MCAGCAMTOKEN	GCAM TOKEN
140	(8C)	CHARACTER	1	MCACONTCH	JCL CONTINUATION CHAR
141	(8D)	CHARACTER	2	MCAVSTRCH	VARIABLE PREFIX
143	(8F)	CHARACTER	1	MCAVENDCH	FREE
144	(90)	ADDRESS	4	*(44)	FREE
320	(140)	ADDRESS	4	MCAHTDBFP	FREE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	12	MCAFLQUE	
0	(0)	ADDRESS	4	MCAANCQP1	FLOPTMSGQU1
4	(4)	ADDRESS	4	MCAANCQP2	FLOPTMSGQU2
8	(8)	ADDRESS	4	MCAANCQPT	FLOPTMSGQUT

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	28	MCADSVIEW	
0	(0)	CHARACTER	16	MCADSV_AD	ADID
16	(10)	CHARACTER	10	MCADSV_IA	IA
26	(1A)	SIGNED	2	MCADSV_OP	OPNUM

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	48	MCAPERFJTBP	
0	(0)	CHARACTER	12	MCAOPERDESC	
12	(C)	SIGNED	4	MCAOPERNUM	
16	(10)	CHARACTER	12	MCAIMEDESC	
28	(1C)	SIGNED	2	MCAIMENUM	
32	(20)	CHARACTER	12	MCAJBTDESC	
44	(2C)	SIGNED	4	MCAJBTNUM	



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	MCAHTPAGE	
0	(0)	CHARACTER	12	MCAHTFIX	
0	(0)	ADDRESS	4	MCAHTNEXT	
4	(4)	ADDRESS	4	MCAHTTOT	
8	(8)	SIGNED	4	MCAHTOFF	
12	(C)	CHARACTER	*	MCAHTEND	

## Cross reference

Name	Hex Offset	Hex Value	Level
DBAFail	F2	40	3
DBAREADY	F2	80	3
FMETHOD	F3	02	3
FPARSER	F3	01	3
FPROCIN	F3	04	3
JQUFAIL	F2	10	3
JQUREADY	F2	20	3
LOCKRC	164		2
MCA	0		1
MCAACEE	E	20	3
MCAADEX	13C	10	3
MCAADGD	13C	80	3
MCAADGR	138	20	3
MCAADJB	138	10	3
MCAADNM	138	80	3
MCAADOW	138	40	3
MCAADSE	13C	04	3
MCAADUF	13D	04	3
MCAADVERRUN	13D	40	3
MCAAIDX	D8		2
MCAANMMP	9C		2
MCAAREAS	4C		2
MCAAREP	70		2
MCAASCB	10		2
MCAASIP	6C		2
MCAASXB	E	40	3
MCAAVILDST	38		2
MCABEXP	D4		2
MCABULKDISCOVERY RUNNING	13E	01	3
MCACJES	F9		2
MCACCLASS	106		2
MCACL CN	13A	02	3
MCACONC#	16B		3
MCACONTCH	8C		2
MCACPAD	138	08	3
MCACPGD	13B	02	3
MCACPGR	138	02	3
MCACPJB	138	01	3
MCACPNQ	58		2

## MCA - Main communication area

Name	Hex Offset	Hex Value	Level
MCACPOW	138	04	3
MCACPSE	13C	02	3
MCACPUF	13D	02	3
MCACPWO	13B	04	3
MCACPWS	139	80	3
MCACTOKEN	148		2
MCADBG	13E	08	3
MCADBGP	158		2
MCADDRSPC	12D		2
MCADESC	0		2
MCADIAP	54		2
MCADSLAS	122		2
MCADSTORE	F		2
MCADSV_AD	0		2
MCADSV_IA	10		2
MCADSV_OP	1A		2
MCADSVIEW	0		1
MCADSVIEWP	28		2
MCADTBAUX	34		2
MCAEDPB	40		2
MCAEDPW	F	20	3
MCAEND	1B0		2
MCAENFTOK41	174		2
MCAENFTOK57	16C		2
MCAESA	E	08	3
MCAETAD	13B	40	3
MCAETNM	13B	80	3
MCAEVHX	CC		2
MCAEXIDB	152	80	3
MCAE105	152	20	3
MCAFARB	160		2
MCAFINDMEM	168		2
MCAFLAGS	E		2
MCAFLAGS2	13E		2
MCAF MID	6		3
MCAFSRAP	78		2
MCAFTAB	1C		2
MCAGCAMTOKEN	88		2
MCAGMTOF	EE		2
MCAGMTSEC	F4		2
MCAHCM	90		2
MCAHTCA	3C		2
MCAHTCAUX	44		2
MCAHTCAUXN	40		2
MCAHTDBFP	140		2
MCAHTEND	C		2
MCAHTFIX	0		2
MCAHTNEXT	0		3
MCAHTOFF	8		3
MCAHTPAGE	0		1
MCAHTSA	7C		2

## MCA - Main communication area

Name	Hex Offset	Hex Value	Level
MCAHTSAUX	78		2
MCAHTSAUXN	74		2
MCAHTTOT	4		3
MCAID	94		2
MCAIDECB	E8		2
MCAJANCP	60		2
MCAJCAD	139	40	3
MCAJCGR	139	04	3
MCAJCJB	139	20	3
MCAJCLDB	152	40	3
MCAJCOW	139	08	3
MCAJCWS	139	10	3
MCAJEKFP	58		2
MCAJEKFR	54		2
MCAJEKLASTIP	6C		2
MCAJEKLASTIPO	70		2
MCAJEKLP	5C		2
MCAJES	F8		2
MCAJESFMID	12E		2
MCAJLD	13D	10	3
MCAJLM	13D	08	3
MCAJNODENO	72		2
MCAJNOFLP	64		2
MCAJNOFP	60		2
MCAJNOFR	50		2
MCAJNOLLP	68		2
MCAJOPTS	98		2
MCAJTAB	C		2
MCAJTBLOCK	13E	04	3
MCAJTBP	18		2
MCAJTBTDESC	20		2
MCAJTBTNUM	2C		2
MCALEVEL	4		2
MCALLOPT	137		2
MCALOCK2B	13F	80	3
MCALOGRCEMPTY	13F	08	3
MCALOGRCLDONE		02	3
MCALOGRCOPEN		10	3
MCALOGRCUPEND		04	3
MCALTAD	139	02	3
MCALTGD	13B	01	3
MCALTOW	139	01	3
MCALVCK	DC		2
MCAMAJNM	FE		2
MCAMCPX	D0		2
MCAMLOG	E	02	3
MCAMLOGD	15C		2
MCAMSGI	178		2
MCAMSGX	A4		2
MCAMTCB	14		2
MCANABB	50		2

## MCA - Main communication area

Name	Hex Offset	Hex Value	Level
MCANJENM	10E		2
MCANMMB	3C		2
MCANOPRM	F	40	3
MCANOWX	B8		2
MCANSUBS	EC		2
MCANVID	11A		2
MCAN069	152	08	3
MCAOIAD	13A	80	3
MCAOPECB	2C		2
MCAOPERDESC	0		2
MCAOPERNUM	C		2
MCAOPTMEM	2C		2
MCAOPTS	18		2
MCAPACE	F	08	3
MCAPDSX	AC		2
MCAPERF	152		2
MCAPERFJTB	0		1
MCAPERFJTBP	48		2
MCAPHBP	124		2
MCAPRIP	44		2
MCAPRMX	B0		2
MCAPRPN	13A	01	3
MCAQFCAN	F	80	3
MCAQFECB	68		2
MCAQFQN	116		2
MCAQUELEN	150		2
MCAQUEPTR	A0		2
MCAQUEX	B4		2
MCARACF	E	10	3
MCARACRTRC	F0		2
MCARDRN	13C	20	3
MCARELX	C8		2
MCARESTART	13F	20	3
MCARLAD	13A	20	3
MCARLGR	13A	08	3
MCARLOW	13A	10	3
MCARLWS	13A	04	3
MCARLWST	13C	40	3
MCARODMOPT	8C		2
MCARREP	88		2
MCARSIP	84		2
MCARTRQ	F	02	3
MCASCLIBDCB	144		2
MCASEQX	A8		2
MCASPIN	123		2
MCASP4	E	04	3
MCASP422	F	10	3
MCASP52	13E	80	3
MCASRAP	48		2
MCASRNM	13B	20	3
MCASSCT	34		2

## MCA - Main communication area

Name	Hex Offset	Hex Value	Level
MCASSNM	FA		2
MCASSVT	30		2
MCASSXP	80		2
MCASTECS	28		2
MCASTEMJ	20		2
MCASTENM	24		2
MCASTOPC	13F	40	3
MCASUB	7C		2
MCASUBRS	138		2
MCASUBX	C4		2
MCASURE	4C		2
MCASYMB	13E	40	3
MCATCPR	F	01	3
MCATIMEDESC	10		2
MCATIMENUM	1C		2
MCATIMESTA	154		2
MCATMLOG	5C		2
MCATPLGYP	140		2
MCATRACES	136		2
MCATSO	E	80	3
MCATSOB	38		2
MCATSRAP	74		2
MCATTR	168		3
MCATWSCNTLSTART	13E	02	3
MCAUPACE	F	04	3
MCAUSERF	14C		2
MCAUX002	13E	20	3
MCAVER	4		3
MCAVJVN	13B	08	3
MCAVJVO	13B	10	3
MCAVSAM	BC		2
MCAVSAMB	C0		2
MCAWAENQ	13E	10	3
MCAWLMQSZ	170		2
MCAWSWS	13A	40	3
MCAXSIP	64		2
MCAZNQD	E0		2
MCAZZSPIN	136	80	3
MCAZ308	152	10	3
MCA313	E	01	3

## MFB - Missed feedback report record in DP

### MFB - Missed feedback report record in DP

Name : DCLMFB

Function:

Describes layout of feedback records representing report data on operations (and occurrences) in the new current plan. The records have the standard recsize and keysize of dpin records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	114	MFBAREA	
0	(0)	CHARACTER	114	MFBKEY	KEY
0	(0)	SIGNED	2	MFBTYPE	TYPE IS ALWAYS 9
2	(2)	CHARACTER	36	*	ADJUST TO ADIDOFFS
38	(26)	CHARACTER	26	MFB OCCID	IDENTIFICATION
38	(26)	CHARACTER	16	MFBADID	ADID OF OCC OF OPERATION
54	(36)	CHARACTER	6	MFBADT	APPL INPUT DATE
54	(36)	CHARACTER	4	*	
58	(3A)	CHARACTER	2	MFBADDD	DAY
60	(3C)	CHARACTER	4	MFBIAHM	APPL INPUT TIME
60	(3C)	CHARACTER	2	MFBIAHH	HOURS
62	(3E)	CHARACTER	2	MFBIAMM	MINUTES
64	(40)	CHARACTER	6	MFBOPID	OPERATION ID
64	(40)	CHARACTER	4	MFBOP	WORKSTATION ID AND
68	(44)	SIGNED	2	MFBOPNO	OPERATION NUMBER
70	(46)	CHARACTER	4	MFBPLDUR	PLANNED DURATION
70	(46)	CHARACTER	2	MFBPLHH	HOURS
72	(48)	CHARACTER	2	MFBPLMM	MINUTES
74	(4A)	CHARACTER	6	MFBACDUR	ACTUAL DURATION
74	(4A)	CHARACTER	4	MFBACHH	HOURS
78	(4E)	CHARACTER	2	MFBACMM	MINUTES
80	(50)	CHARACTER	1	MFBREASN	REASON FOR MISSED FDB
					L=LIMIT EXCEEDED
					O=AD RECORD IN USE
81	(51)	CHARACTER	1	MFBORIGIN	ORIGIN
82	(52)	SIGNED	2	MFB RUNID	RUN CYCLE ID
84	(54)	CHARACTER	6	MFBPLDEAD	PLANNED DEADLINE
84	(54)	CHARACTER	2	MFBPLDD	DAY OFFSET DD
86	(56)	CHARACTER	2	MFBPLDH	HOURS HH
88	(58)	CHARACTER	2	MFBPLDM	MINUTES MM
90	(5A)	CHARACTER	10	MFBACDEAD	ACTUAL DEADLINE
90	(5A)	CHARACTER	4	*	
94	(5E)	CHARACTER	2	MFBACDD	DD
96	(60)	CHARACTER	2	MFBACDH	HOURS HH
98	(62)	CHARACTER	2	MFBACDM	MINUTES MM
100	(64)	CHARACTER	14	*	TO ADD UP TO KEYSIZE

### Cross reference

Name	Hex Offset	Hex Value	Level
MFBACDD	5E		4
MFBACDEAD	5A		3
MFBACDH	60		4

## MFB - Missed feedback report record in DP

Name	Hex Offset	Hex Value	Level
MFBACDM	62		4
MFBACDUR	4A		3
MFBACHH	4A		4
MFBACMM	4E		4
MFBADID	26		4
MFBAREA	0		1
MFBIAADD	3A		5
MFBIAADT	36		4
MFBIAHH	3C		5
MFBIAHM	3C		4
MFBIAAMM	3E		5
MFBKEY	0		2
MFB OCCID	26		3
MFBOP	40		4
MFBOPID	40		3
MFBOPNO	44		4
MFBORIGIN	51		3
MFBPLDD	54		4
MFBPLDH	56		4
MFBPLDM	58		4
MFBPLDEAD	54		3
MFBPLDUR	46		3
MFBPLHH	46		4
MFBPLMM	48		4
MFBREASN	50		3
MFB RUNID	52		3
MFBTYPE	0		3

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## MTD - Track information

Name : DCLMTD

Function:

Contains data used to update the current plan after dialog modifications or after a restart. The MTD is included in some MT0 records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	MTD	MCP TRACK ENTRY
0	(0)	CHARACTER	4	MTDHEAD	HEADER OF ENTRY
0	(0)	SIGNED	2	MTDTYPE	TYPE OF ENTRY
2	(2)	SIGNED	2	MTDOPER	OPERATION NUMBER
4	(4)	CHARACTER	*	MTDBODY	TRACKING DATA BODY

## Add or change operation MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	64	MTD_ADD_OP	ADD/CHANGE OPER ENTRY (1)

## MTD - Track information

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	8	MTDJOB	JOB NAME (ALSO IN JOBOPTS)
8	(8)	CHARACTER	4	MTDWSNM	WORKSTATION NAME
12	(C)	CHARACTER	24	MTDTEXT	OPERATION TEXT
36	(24)	SIGNED	2	*	FREE
38	(26)	SIGNED	2	MTDPSUSE	PARALLEL SERVERS
40	(28)	SIGNED	2	MTDR1USE	RESOURCE R1 NEEDED
42	(2A)	SIGNED	2	MTDR2USE	RESOURCE R2 NEEDED
44	(2C)	CHARACTER	16	MTD_USERDATA	OPERATION USERDATA
60	(3C)	SIGNED	4	MTDEDUR	ESTIMATED DURATION
64	(40)	CHARACTER		MTD_ADD_OP_END	END OF ENTRY

## Add or change special resource MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	52	MTD_ADD_SR	ADD/CHANGE SPEC RES (3)
0	(0)	CHARACTER	44	MTD_DEL_SR	DELETE SEPC RES (4)
0	(0)	CHARACTER	44	MTDRESN	SPECIAL RESOURCE NAME
44	(2C)	CHARACTER		MTD_DEL_SR_END	END OF ENTRY
44	(2C)	CHARACTER	1	MTDREST	RESOURCE TYPE (SHR/EXCL)
45	(2D)	CHARACTER	1	MTDRESE	ON ERROR FLAG
46	(2E)	CHARACTER	1	MTDRESC	ON COMPLETE FLAG
47	(2F)	CHARACTER	1	*	RESERVED
48	(30)	SIGNED	4	MTDRESQ	RESOURCE QUANTITY
52	(34)	CHARACTER		MTD_ADD_SR_END	END OF ENTRY

## Operation options MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	31	MTD_OPTS	JOB OPTIONS (5)
0	(0)	CHARACTER	8	MTDOPTJN	JOB NAME
8	(8)	CHARACTER	1	MTDCLASS	JOB/SYSOUT CLASS
9	(9)	CHARACTER	1	MTDOPTS	JOB OPTIONS
				MTDAEC	AUTOMATIC TRACKING
				MTDSUB	AUTOMATIC SUBMIT
				MTDAJR	AUTOMATIC HOLD/RELEASE
				MTDTJT	TIME JOB
				MTDCAN	SUPPRESS IF LATE
				MTDHRC	HIGHEST RETCODE SET
				MTDDWTO	DEADLINE WTO
				*	RESERVED
10	(A)	CHARACTER	1	MTDOPTS2	MORE OPTIONS
				MTDRESTA	RESTARTABLE
				MTDDIRES	RESTARTABLE BY INSTALL
				MTDRERUT	REROUTEABLE
				MTDDIRER	REROUTEABLE BY INSTALL
				MTDEXPJCL	EXPANDED JCL USED
				MTDUSRSYS	USER SYSOUT USED
				MTDCLASST	CLASS PRESENT
				MTDFORM#T	FORM PRESENT
11	(B)	CHARACTER	4	MTDHRCNE	HIGHEST RETURN CODE



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
11	(B)	CHARACTER	2	*	HIGHEST RETURN CODE
13	(D)	CHARACTER	2	MTDHRCNX	HIGHEST RETURN CODE
15	(F)	CHARACTER	8	MTDFORM#	FORM NUMBER
23	(17)	CHARACTER	8	MTDOPTS3	MORE OPTIONS
23	(17)	CHARACTER	2	MTDWLM	WLM fields
23	(17)	CHARACTER	1	MTDJOBCRT	Critical Job
24	(18)	CHARACTER	1	MTDJOBPOL	Late Job Policy
25	(19)	CHARACTER	1	MTDOPTS5	
				MTDMON	OPERATION MONITORING FLAG
				MTDCHGMON	SET TO ON IF MONITORING FLAG VALUE HAS CHANGED
				MTDSCRIPT	CENTRALIZED SCRIPT
				*	FREE
26	(1A)	CHARACTER	5	MTDOPTS4	MORE OPTIONS
26	(1A)	CHARACTER	1	MTDRCLN	RESTART AND CLEANUP
27	(1B)	CHARACTER	8	MTDWLMCLASS	WLM SERVICE CLASS
31	(1F)	CHARACTER		MTD_OPTS_END	END OF ENTRY

### Operation status MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	1	MTD_STATUS	JOB STATUS (6)
0	(0)	CHARACTER	1	MTDSTAT	NEW OPERATION STATUS
1	(1)	CHARACTER		MTD_STATUS_END	END OF ENTRY

### Operation times MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	20	MTD_TIMES	CHG OPERATION TIMES (7)
0	(0)	CHARACTER	10	MTDIA	OPR IA DATE AND TIME
0	(0)	CHARACTER	6	MTDIAD	DATE
6	(6)	CHARACTER	4	MTDIAT	TIME
10	(A)	CHARACTER	10	MTDDL	OPR DL DATE AND TIME
10	(A)	CHARACTER	6	MTDDL	DATE
16	(10)	CHARACTER	4	MTDDL	TIME
20	(14)	CHARACTER		MTD_TIMES_END	END OF ENTRY

### Modify external dependency MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	31	MTD_EXT_DEP	ADD/DEL/CH EXT DEP (8,9)
0	(0)	CHARACTER	5	MTD_INT_DEP	ADD/DEL/CH INT DEP (10,11)
0	(0)	SIGNED	2	MTDDEPN	PREDECESSOR OPER NUMBER
2	(2)	CHARACTER	1	MTDDEPT	DEPENDENCY TYPE

## MTD - Track information

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
3	(3)	CHARACTER		MTD_DEL_INT_END	END OF ENTRY
3	(3)	SIGNED	2	MTDTRST	TRANSPORT TIME
5	(5)	CHARACTER		MTD_ADD_INT_END	END OF ENTRY
5	(5)	CHARACTER	16	MTDDAID	PRED/SUCC APPLIC NAME
21	(15)	CHARACTER	10	MTDDIA	PRED/SUCC IINPUT ARRIVAL
21	(15)	CHARACTER	6	MTDDIAD	PRED/SUCC IA DATE
27	(1B)	CHARACTER	4	MTDDIAT	PRED/SUCC IA TIME
31	(1F)	CHARACTER		MTD_DEL_EXT_END	END OF ENTRY
31	(1F)	CHARACTER		MTD_ADD_EXT_END	END OF ENTRY

## Error code change MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	4	MTD_ERC	ERROR CODE CHANGE
0	(0)	CHARACTER	4	MTDERRC	NEW ERROR CODE
4	(4)	CHARACTER		MTD_ERC_END	END OF ENTRY

## Change catalog management actions MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	62	MTD_CH_CM	DEL/CHANGE CM
0	(0)	CHARACTER	1	MTD_CH_CMACT	ACTION D=DISCARD
1	(1)	CHARACTER	8	MTDSTEPNM	STEPNAME
9	(9)	CHARACTER	8	MTDPROCSTP	PROC STEPNAME OR BLNK
17	(11)	CHARACTER	44	MTDDSN	DATASET NAME
61	(3D)	CHARACTER	1	MTD_DISC_ALL	Y = DISCARD ALL DS
62	(3E)	CHARACTER		MTD_CH_CM_END	END OF ENTRY

## Held, NOP, EX operation MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	14	MTD_HOP	HOP MTD PART
0	(0)	CHARACTER	2	MTD_HOP_REQ	MH = MAN HOLD MR = MAN RELEASE NP = NOP UN = UN-NOP EX = EXECUTE
2	(2)	CHARACTER	8	MTD_HOP_JBNAME	JOB NAME
10	(A)	CHARACTER	4	MTD_HOP_WSNAME	WORKSTATION NAME
14	(E)	CHARACTER		MTD_HOP_END	END OF ENTRY

## Step restart MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	64	MTD_SLR	SLR MTD PART
0	(0)	CHARACTER	8	MTD_SLR_SSTEP	SELECTED STEP

## MTD - Track information

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	8	MTD_SLR_EXDEST	EXEC DESTINATION ----- NOTE: MTD_SLR_EXDEST IS ONLY USED WHEN ADDING OPERS FROM THE DB2 DATABASE, SO CALLED HISTORY ADD. YOU CAN RECOGNIZE THIS BY INV. FLAG MT0HI_ADD. IF SET, THIS MTD TYPE IS USED TO PASS THE EXEC DESTINATION FROM THE DIALOG TO MCP PROCESSOR -----
8	(8)	CHARACTER	8	MTD_SLR_SPSTEP	SELECTED PROC STEP
8	(8)	CHARACTER	8	MTD_SLR_OUDEST	EXEC DESTINATION
16	(10)	CHARACTER	8	MTD_SLR_SESTEP	SELECTED END STEP
24	(18)	CHARACTER	8	MTD_SLR_SEPSTEP	SELECTED END PROCSTEP
32	(20)	CHARACTER	8	MTD_SLR_CSTEP	CM INITIATION STEP
40	(28)	CHARACTER	8	MTD_SLR_CPSTEP	CM INITIATION PSTEP
48	(30)	CHARACTER	8	MTD_SLR_CESTEP	CM INITIATION ENDSTEP
56	(38)	CHARACTER	8	MTD_SLR_CEPSTEP	CM INITIATION END PSTP
56	(38)	CHARACTER	8	MTD_SLR_EXDEST	EXEC DESTINATION
64	(40)	CHARACTER	8	MTD_SLR_END	END OF ENTRY

## Extended name MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	200	MTD_ADD_EXTINFO	ADD EXTENDED INFO AREA
0	(0)	CHARACTER	200	MTD_DEL_EXTINFO	DELETE EXTENDED INFO AREA
0	(0)	CHARACTER	54	MTDEXTNAME	EXTENDED JOB NAME
54	(36)	CHARACTER	16	MTDSENAME	SCHEDULING ENVIRONMENT NAME
70	(46)	CHARACTER	130	*	FREE
200	(C8)	CHARACTER		MTD_DEL_EXTINFO_END	END OF DELETE EXTENDED INFO
200	(C8)	CHARACTER		MTD_ADD_EXTINFO_END	END OF ADD EXTENDED INFO

## System automation information MTD

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	336	MTD_ADD_AUTINFO	ADD SYSTEM AUTOMATION INFO
0	(0)	CHARACTER	256	MTDCOMMTEXT	SYSTEM AUTOMATION COMMAND TEXT
0	(0)	CHARACTER	64	MTDCOMMTEX1	COMMAND TEXT, LINE 1
64	(40)	CHARACTER	64	MTDCOMMTEX2	COMMAND TEXT, LINE 2
128	(80)	CHARACTER	64	MTDCOMMTEX3	COMMAND TEXT, LINE 3
192	(C0)	CHARACTER	64	MTDCOMMTEX4	COMMAND TEXT, LINE 4

## MTD - Track information

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
256	(100)	CHARACTER	8	MTDAUTOOPER	AUTOMATED FUNCTION (FOR OPERATION)
264	(108)	CHARACTER	8	MTDSECELEM	SECURITY ELEMENT
272	(110)	CHARACTER	64	MTDCOMPINFO	COMPLETION INFO
336	(150)	CHARACTER		MTD_ADD_AUTINFO_END	END OF ENTRY
0	(0)	CHARACTER		MTD_DEL_AUTINFO	DELETE SYSTEM AUTOMATION INFO
0	(0)	CHARACTER		MTD_DEL_AUTINFO_END	END OF ENTRY

## Add condition MTD

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	32	MTD_ADD_COND	
0	(0) SIGNED	2	MTDACOND_CID	
2	(2) SIGNED	2	MTDACOND_TYPE	
4	(4) SIGNED	2	MTDACOND_SIMPNO	
6	(6) SIGNED	2	MTDACOND_COUNT	
8	(8) CHARACTER	24	MTDACOND_DESC	
32	(20) CHARACTER		MTD_ADD_COND_END	

## Delete condition MTD

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	2	MTD_DEL_COND	
0	(0) SIGNED	2	MTDDCOND_CID	
2	(2) CHARACTER		MTD_DEL_COND_END	

## Modify condition MTD

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	30	MTD_MOD_COND	
0	(0) SIGNED	2	MTDMCOND_CID	
2	(2) CHARACTER	24	MTDMCOND_DESC	
26	(1A) SIGNED	2	MTDMCOND_TYPE	
28	(1C) SIGNED	2	MTDMCOND_COUNT	
30	(1E) CHARACTER		MTD_MOD_COND_END	

## Add or delete condition dependency

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	43	MTD_ESIMP	
0	(0) CHARACTER	17	MTD_ISIMP	
0	(0) SIGNED	2	MTDSIMP_CID	
2	(2) SIGNED	2	MTDSIMP_OPNO	
4	(4) CHARACTER	2	MTDSIMP_TYP	RC OR ST
6	(6) CHARACTER	2	MTDSIMP_LOG	RG, EQ, NE
8	(8) CHARACTER	4	MTDSIMP_VALRC	RC1 VALUE
12	(C) CHARACTER	4	MTDSIMP_VALRC2	RC2 VALUE
16	(10) CHARACTER	1	MTDSIMP_VALST	ST VALUE
17	(11) CHARACTER		MTD_ADD_ISIMP_END	
17	(11) CHARACTER		MTD_DEL_ISIMP_END	
17	(11) CHARACTER	16	MTDSIMP_AID	
33	(21) CHARACTER	10	MTDSIMP_IA	
33	(21) CHARACTER	6	MTDSIMP_IAD	
39	(27) CHARACTER	4	MTDSIMP_IAT	
43	(2B) CHARACTER		MTD_ADD_ESIMP_END	
43	(2B) CHARACTER		MTD_DEL_ESIMP_END	

## Add external conditional successor

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	74	MTD_EXT_CSUC
0	(0)	SIGNED	2	MTDCSUC_CID
2	(2)	SIGNED	2	MTDCSUC_OPNO
4	(4)	CHARACTER	2	MTDCSUC_TYP
6	(6)	CHARACTER	2	MTDCSUC_LOG
8	(8)	CHARACTER	4	MTDCSUC_VALRC
12	(C)	CHARACTER	4	MTDCSUC_VALRC2
16	(10)	CHARACTER	1	MTDCSUC_VALST
17	(11)	CHARACTER	1	*
18	(12)	CHARACTER	16	MTDCSUC_AID
34	(22)	CHARACTER	10	MTDCSUC_IA
34	(22)	CHARACTER	6	MTDCSUC_IAD
40	(28)	CHARACTER	4	MTDCSUC_IAT
44	(2C)	CHARACTER	30	MTDCSUC_COND
44	(2C)	CHARACTER	24	MTDCSUC_CONDDDESC
68	(44)	SIGNED	2	MTDCSUC_CONDTYPE
70	(46)	SIGNED	2	MTDCSUC_CONDCNT
72	(48)	SIGNED	2	MTDCSUC_CONDSNO
74	(4A)	CHARACTER		MTD_EXT_CSUC_END

## Reset undefined condition dependency

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	60	MTD_ESETST
0	(0)	CHARACTER	34	MTD_ISETST
0	(0)	SIGNED	2	MTDSETS_CID
2	(2)	SIGNED	2	MTDSETS_OPNO
4	(4)	CHARACTER	2	MTDSETS_TYP
6	(6)	CHARACTER	2	MTDSETS_LOG
8	(8)	CHARACTER	4	MTDSETS_VALRC
12	(C)	CHARACTER	4	MTDSETS_VALRC2
16	(10)	CHARACTER	1	MTDSETS_VALST
17	(11)	CHARACTER	8	MTDSETS_STEPN
25	(19)	CHARACTER	8	MTDSETS_PROCS
33	(21)	CHARACTER	1	MTDSETS_NEWST
34	(22)	CHARACTER		MTD_ISETST_END
34	(22)	CHARACTER	16	MTDSETS_AID
50	(32)	CHARACTER	10	MTDSETS_IA
50	(32)	CHARACTER	6	MTDSETS_IAD
56	(38)	CHARACTER	4	MTDSETS_IAT
60	(3C)	CHARACTER		MTD_ESETST_END

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	70	MTD_ADD_USRF
0	(0)	CHARACTER	16	MTDAUSRF_NAME
16	(10)	CHARACTER	54	MTDAUSRF_VALUE
70	(46)	CHARACTER		MTD_ADD_USRF_END

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	70	MTD_DEL_USRF
0	(0)	CHARACTER	16	MTDDUSRF_NAME
16	(10)	CHARACTER	54	MTDDUSRF_VALUE
70	(46)	CHARACTER		MTD_DEL_USRF_END

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	70	MTD_MOD_USRF
0	(0)	CHARACTER	16	MTDMUSRF_NAME
16	(10)	CHARACTER	54	MTDMUSRF_VALUE
70	(46)	CHARACTER		MTD_MOD_USRF_END

Offsets	Type	Length	Name	Description
0	(0)	STRUCTURE	20	MTD_AMOZ_RENGINFO
0	(0)	CHARACTER	16	MTDAMO_RENGZ_ADID
16	(10)	CHARACTER	3	MTDAMO_RENGZ_OPNUM
19	(13)	CHARACTER	1	MTDAMO_RENGZ_IFBIND
20	(14)	CHARACTER		MTD_AMOZ_RENGINFO_END

## MTD - Track information

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	73	MTD_AMOD_RENGINFO	
0	(0) CHARACTER	16	MTDAMO_RENGD_WSN	
16	(10) CHARACTER	16	MTDAMO_RENGD_ADID	
32	(20) CHARACTER	40	MTDAMO_RENGD_JOBNAME	
72	(48) CHARACTER	1	MTDAMO_RENGD_IFBIND	
73	(49) CHARACTER		MTD_AMOD_RENGINFO_END	
Offsets	Type	Length	Name	Description
0	(0) STRUCTURE		MTD_DEL_RENGINFO	
0	(0) CHARACTER		MTD_DEL_RENGINFO_END	

## Cross reference

NAME	HEX OFFSET	HEX VALUE	LEVEL
MTD	0		1
MTD_ADD_AUTINFO	0		1
MTD_ADD_AUTINFO_END	150		2
MTD_ADD_COND	0		1
MTD_ADD_COND_END	20		2
MTD_ADD_ESIMP_END	3B		2
MTD_ADD_EXT_END	1F		2
MTD_ADD_EXTINFO	0		1
MTD_ADD_EXTINFO_END	C8		2
MTD_ADD_INT_END	5		3
MTD_ADD_ISIMP_END	21		3
MTD_ADD_OP	0		1
MTD_ADD_OP_END	40		2
MTD_ADD_SR	0		1
MTD_ADD_SR_END	34		2
MTD_ADD_USRF	0		1
MTD_ADD_USRF_END	46		2
MTD_AMOD_RENGINFO	0		1
MTD_AMOD_RENGINFO_END	49		2
MTD_AMOZ_RENGINFO	0		1
MTD_AMOZ_RENGINFO_END	14		2
MTD_CH_CM	0		1
MTD_CH_CM_END	3E		2
MTD_CH_CMACT	0		2
MTD_DEL_AUTINFO	0		1
MTD_DEL_AUTINFO_END	0		2
MTD_DEL_COND	0		1
MTD_DEL_COND_END	2		2
MTD_DEL_ESIMP_END	3B		2
MTD_DEL_EXT_END	1F		2
MTD_DEL_EXTINFO	0		2
MTD_DEL_EXTINFO_END	C8		2
MTD_DEL_INT_END	3		3
MTD_DEL_ISIMP_END	21		3
MTD_DEL_RENGINFO	0		1
MTD_DEL_RENGINFO_END	0		2
MTD_DEL_SR	0		2
MTD_DEL_SR_END	2C		3
MTD_DEL_USRF	0		1
MTD_DEL_USRF_END	0		2
MTD_DISC_ALL	3D		2
MTD_ERC	0		1
MTD_ERC_END	4		2
MTD_ESETST	0		1
MTD_ESETST_END	3C		2
MTD_ESIMP	0		1
MTD_EXT_CSUC	0		1
MTD_EXT_CSUC_END	5A		2
MTD_EXT_DEP	0		1
MTD_HOP	0		1
MTD_HOP_END	E		2

## MTD - Track information

MTD_HOP_JBNAME	2		2
MTD_HOP_REQ	0		2
MTD_HOP_WSNAME	A		2
MTD_INT_DEP	0		2
MTD_ISETST	0		2
MTD_ISETST_END	22		3
MTD_ISIMP	0		2
MTD_MOD_COND	0		1
MTD_MOD_COND_END	1E		2
MTD_MOD_USRF	0		1
MTD_DOD_USRF_END	0		2
MTD_OPTS	0		1
MTD_OPTS_END	23		2
MTD_SLR	0		1
MTD_SLR_CEPSTEP	38		2
MTD_SLR_CESTEP	30		2
MTD_SLR_CPSTEP	28		2
MTD_SLR_CSTEP	20		2
MTD_SLR_END	40		2
MTD_SLR_EXDEST	0		3
MTD_SLR_OUDEST	8		3
MTD_SLR_SEPSTEP	18		2
MTD_SLR_SESTEP	10		2
MTD_SLR_SPSTEP	8		2
MTD_SLR_SSTEP	0		2
MTD_STATUS	0		1
MTD_STATUS_END	1		2
MTD_TIMES	0		1
MTD_TIMES_END	14		2
MTD_USERDATA	2C		2
MTDACOND_CID	0		2
MTDACOND_COUNT	6		2
MTDACOND_DESC	8		2
MTDACOND_SIMPNO	4		2
MTDACOND_TYPE	2		2
MTDAEC	9	80	3
MTDAJR	9	20	3
MTDAMO_RENGD_ADID	10		2
MTDAMO_RENGD_IFBIND	48		2
MTDAMO_RENGD_JOBNAME	20		2
MTDAMO_RENGD_WSN	0		2
MTDAMO_RENGZ_ADID	0		2
MTDAMO_RENGZ_IFBIND	13		2
MTDAMO_RENGZ_OPNUM	10		2
MTDAUSRF_NAME	0		2
MTDAUSRF_VALUE	10		2
MTDAUTOOPER	100		2
MTDBODY	4		2
MTDCAN	9	08	3
MTDCHGMON	19	40	4
MTDCLASS	8		2
MTDCLASST	A	02	3
MTDCOMMTEXT	0		2
MTDCOMMTEX1	0		3
MTDCOMMTEX2	40		3
MTDCOMMTEX3	80		3
MTDCOMMTEX4	C0		3
MTDCOMPINFO	110		2
MTDCONDRJOB	9	01	3
MTDCSUC_AID	22		2
MTDCSUC_CID	0		2
MTDCSUC_COND	3C		2
MTDCSUC_CONDCNT	56		3
MTDCSUC_CONDDDESC	3C		3
MTDCSUC_CONDSNO	58		3
MTDCSUC_CONDTYPE	54		3
MTDCSUC_IA	32		2

## MTD - Track information

MTDCSUC_IAD	32		3
MTDCSUC_IAT	38		3
MTDCSUC_LOG	6		2
MTDCSUC_OPNO	2		2
MTDCSUC_PROCS	19		2
MTDCSUC_STEPN	11		2
MTDCSUC_TYP	4		2
MTDCSUC_VALRC	8		2
MTDCSUC_VALRC2	C		2
MTDCSUC_VALST	10		2
MTDDAID	5		2
MTDDCOND_CID	0		2
MTDDEPN	0		3
MTDDEPT	2		3
MTDDIA	15		2
MTDDIAD	15		3
MTDDIAT	1B		3
MTDDIRER	A	10	3
MTDDIRES	A	40	3
MTDDL	A		2
MTDDL	A		3
MTDDL	10		3
MTDDSN	11		2
I MTDDUSRF_NAME	0		2
I MTDDUSRF_VALUE	10		2
MTDDWTO	9	02	3
MTDEDUR	3C		2
MTDERRC	0		2
MTDEXPJCL	A	08	3
MTDEXTNAME	0		3
MTDFORM#	F		2
MTDFORM#T	A	01	3
MTDHEAD	0		2
MTDHRC	9	04	3
MTDHRCNE	B		2
MTDHRCNX	D		3
MTDIA	0		2
MTDIAD	0		3
MTDIAT	6		3
MTDJBCRT	17		4
MTDJOB	0		2
MTDJOBPOL	18		4
MTDMCOND_CID	0		2
MTDMCOND_COUNT	1C		2
MTDMCOND_DESC	2		2
MTDMCOND_TYPE	1A		2
MTDMON	19	80	4
I MTDMUSRF_NAME	0		2
I MTDMUSFR_VALUE	10		2
TDOPER	2		3
MTDOPTJN	0		2
MTDOPTS	9		2
MTDOPTS2	A		2
MTDOPTS3	17		2
MTDOPTS4	1A		2
MTDOPTS5	19		3
MTDPROCSTP	9		2
MTDPSUSE	26		2
MTDRCLN	1A		3
MTDRERUT	A	20	3
MTDRESC	2E		2
MTDRESE	2D		2
MTDRESN	0		3
MTDRESQ	30		2
MTDREST	2C		2
MTDRESTA	A	80	3
MTDR1USE	28		2



MTDR2USE	2A		2
MTDSCRIPT	19	20	4
MTDSECELEM	108		2
MTDSENAME	36		3
MTDSETS_AID	22		2
MTDSETS_CID	0		3
MTDSETS_IA	32		2
MTDSETS_IAD	32		3
MTDSETS_IAT	38		3
MTDSETS_LOG	6		3
MTDSETS_NEWST	21		3
MTDSETS_OPNO	2		3
MTDSETS_PROCS	19		3
MTDSETS_STEPN	11		3
MTDSETS_TYP	4		3
MTDSETS_VALRC	8		3
MTDSETS_VALRC2	C		3
MTDSETS_VALST	10		3
MTDSIMP_AID	21		2
MTDSIMP_CID	0		3
MTDSIMP_IA	31		2
MTDSIMP_IAD	31		3
MTDSIMP_IAT	37		3
MTDSIMP_LOG	6		3
MTDSIMP_OPNO	2		3
MTDSIMP_PROCS	19		3
MTDSIMP_STEPN	11		3
MTDSIMP_TYP	4		3
MTDSIMP_VALRC	8		3
MTDSIMP_VALRC2	C		3
MTDSIMP_VALST	10		3
MTDSTAT	0		2
MTDSTEPNM	1		2
MTDSUB	9	40	3
MTDTEXT	C		2
MTDTJT	9	10	3
MTDTRST	3		3
MTDTYPE	0		3
MTDUSRSYS	A	04	3
MTDWLM	17		3
MTDWLMCLASS	1B		3
MTDWSNM	8		2

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## MT0 - MCP tracking information entry

Name : DCLMT0

Function:

Contains data used to update the CP with changes from the MCP dialog, PIF, API, AR, ETT.

It is also used to map the tracklog record TRL24 after a successful MCP update.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	41	MT0	MCP TRACK ENTRY
0	(0)	CHARACTER	4	MT0EYE	EYE CATCHER
4	(4)	CHARACTER	2	MT0VER	VERSION
6	(6)	BITSTRING	1	MT0FLGS	flag bits
				MT0CHK	1=CHECK REQUEST
				MT0ERROR	1=ERROR IS DETECTED
				MT0DRLST	1=USE LAST OCC IN CP FOR DEP RESOLUTION

## MT0 - MCP tracking information entry

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				MT0DRLAT	1=USE LATEST OCC PREC ADDED OCC FOR DEP RES
				MT0CONTINUED	ANOTHER MT0 FOLLOWS
				MT0AERR	ACCEPT ERROR
				MT0PIFAD	PIF SUPPLIED AD
				MT0FOPD	FAKED OP DATES
7	(7)	CHARACTER	1	MT0TYPE	TYPE OF CHANGE
8	(8)	CHARACTER	1	MT0CALLER	FUNCTION CALLING MCP A->AR,E->ETT,P->PIF
9	(9)	BITSTRING	1	MT0FLAGS	ADDITIONAL FLAGS
				MT0TURNOV	1=TURNOVER IN PROGRESS
				MT0RESTART	1=CP RESTART IN PROGRESS
				MT0AUTODEP	1=ADD EXT DEPENDENCIES
				MT0RESOLVE	1=DEPS MUST BE RESOLVED
				MT0CMRER	1=POTENTIAL CM BEFORE OPER IS RERUN
				MT0IGNORE	IGNORE THIS MT0
				MT0GR_ADD	THIS MT0 IS PART OF A GROUP ADD TRNX
				MT0NOTLT	1=DONT USE LT FILE
10	(A)	CHARACTER	10	MT0CPE	CURRENT PLAN END
10	(A)	CHARACTER	6	MT0CPED	DATE AND TIME
16	(10)	CHARACTER	4	MT0CPET	SET BY SUBSYST IF ERR ----- MT0CPE IS USED TO HOLD OLD IA WHEN ADDING HISTORY OCCURRENCES TO CURRENT PLAN -----
20	(14)	CHARACTER	8	MT0MSGID	MSG, IF ACCEPTED ERR
20	(14)	CHARACTER	8	MT0STMP	TIME STAMP OF UPDATE
20	(14)	SIGNED	4	MT0MIVLOFF	MODIFY IVL OFFSETT
20	(14)	CHARACTER	4	MT0DATE	DATE OF UPDATE
24	(18)	CHARACTER	4	MT0TIME	TIME OF UPDATE
28	(1C)	SIGNED	4	MT0LGTH	LENGTH OF ENTIRE RECORD
32	(20)	CHARACTER		MT0OCCTOK	MT0 OCCURRENCE TOKEN
40	(28)	BITSTRING	1	MT0FLAG3	FLAGS
				MT0PSU_APPL	1=FROM APPLY LOGIC
				MT0CHG	1=RECORD CHANGED
				MT0CHSTRER	1=CHANGE STATUS FOR RERUN
				MT0CAUTOSUC	1=COND SUCC AUTO SOLVE
				MT0INGROUP	1=IN A GROUP
				MT0SJR	1=SJR
				MT0XRERUN	1=CHANGE OCC FOR RERUN
				*	FREE
41	(29)	CHARACTER		MT0BODY	BODY OF CHANGE

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
10	(A)	STRUCTURE	8	MT0RQSST	START BUILDING MT0, OR OS
10	(A)	CHARACTER	4	MT0RQSSTD	DATE
14	(E)	CHARACTER	4	MT0RQSSTT	TIME

## Change workstation MT0

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	8	MT0WS	
0	(0)	CHARACTER	4	MT0WSN	WORK STATION NAME
4	(4)	CHARACTER	1	MT0REP	NEW REPORTING ATTRIBUTE
5	(5)	CHARACTER	1	MT0WCF	CONTROL FLAGS
				MT0WCP	CONTROL ON SERVERS
				MT0WC1	CONTROL ON RESOURCE 1
				MT0WC2	CONTROL ON RESOURCE 2
				MT0TWS	FAULT-TOLERANT WORKSTATION
				*	SPARE
6	(6)	SIGNED	2	MT0W#I	NUMBER OF INTERVALS
8	(8)	CHARACTER		MT0MWS	WS OPEN INTERVALS SEE DCLIVL(IVLDATA)

## VARY WORKSTATION STATUS MT0

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	12	MT0VARY	
0	(0)	CHARACTER	4	MT0V_WSN	WORK STATION NAME
4	(4)	CHARACTER	1	MT0V_STAT	NEW WS STATUS
5	(5)	BITSTRING	1	MT0V_OPT	FAILURE OPTIONS
				MT0V_OPT_FLEAV	LEAVE STARTED
				MT0V_OPT_FERR	ERROR SET
				MT0V_OPT_FREST	RESTART
				MT0V_OPT_RLEAV	LEAVE SCHEDULED
				MT0V_OPT_RRERU	REROUTE
				MT0V_OPT_RIMMD	IMMEDIATELY AVAILABLE
				*	RESERVED
6	(6)	CHARACTER	4	MT0V_AWS	ALTERNATE WS NAME
10	(A)	CHARACTER	1	MT0V_LINK	LINK STATUS
11	(B)	BITSTRING	1	MT0V_VAR	STATUS AND LINK VARY
				MT0V_VAR_LINK	LINK VARY
				MT0V_VAR_STATUS	STATUS VARY
				*	RESERVED

## Occurrence add, delete, modify MT0

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	96	MT0OCC	ADD/CHANGE OPER ENTRY
0	(0)	CHARACTER	26	MT0KEY	OCCURRENCE KEY
0	(0)	CHARACTER	16	MT0AID	APPLICATION NAME
16	(10)	CHARACTER	10	MT0IM	MODIFIED INPUT ARRIVAL
16	(10)	CHARACTER	6	MT0IMD	NEW VALUE
22	(16)	CHARACTER	4	MT0IMT	CHANGED IN CHANGE OCC REQ
26	(1A)	CHARACTER	10	MT0IA	OCCURRENCE IDENTIFIER IA
26	(1A)	CHARACTER	6	MT0IAD	SAME AS MT0IM IF NOT A

## MT0 - MCP tracking information entry

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
32	(20)	CHARACTER	4	MT0IAT	CHANGE OCCURRENCE REQUEST
36	(24)	CHARACTER	10	MT0DL	OCCURRENCE DEADLINE
36	(24)	CHARACTER	6	MT0DLT	DEADLINE DATE
42	(2A)	CHARACTER	4	MT0DLT	DEADLINE TIME
46	(2E)	CHARACTER	1	MT0PRI	PRIORITY
47	(2F)	CHARACTER	4	MT0ERR	ERROR CODE
51	(33)	BITSTRING	1	MT0OCFLG	GENERAL FLAG
				MT0IMSET	PIF PROVIDED IANNEW
				MT0DLSET	PIF PROVIDED DEADLINE
				MT0REAS	REASON BLOCK EXISTS
				MT0HI_ADD	HISTORY OCCURRENCE ADD
				MT0HI_CHG	HISTORY OCCURRENCE CHG
				MT0TOLER	TOLERATE
				MT0CHGALLMON	CHANGE MONITORING FLAG FOR ALL OPERATIONS IN OCCURRENCE
				MT0MON	OPERATION MONITORING FLAG VALUE IF MT0CHGALLMON=ON
				MT0GROUPM	ON IF OCCURRENCE OF GROUP IS MODIFIED
52	(34)	CHARACTER	16	MT0JVT	JCL VAR TABLE NAME
68	(44)	CHARACTER	16	MT0GROUPDEF	OCCURRENCE GROUP DEF
84	(54)	BITSTRING	1	MT0OCFLG1	
				MT0MHELD	SET ALL THE OPERATIONS TO THE MT0MHELDV VALUE
				MT0MHELDV	MHELD VALUE
				*	FREE
85	(55)	CHARACTER	11	MT0OCFLG2	FREE
96	(60)	CHARACTER		MT0OCD	OPERATION DETAILS SEE DCLMTD

## Rerun occurrence MT0

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	336	MT0RSTRT	SECTION ON RESTART
0	(0)	CHARACTER	8	MT0RSJOB	JOB NAME
8	(8)	CHARACTER	4	MT0RSERR	ERROR CODE
12	(C)	CHARACTER	16	MT0RSUSR	USER DATA FIELD
28	(1C)	CHARACTER	300	MT0RSREASON	REASON FOR RERUN
328	(148)	CHARACTER	8	MT0RSPANEL	PANEL WHERE REASON TEXT ENTERED
336	(150)	CHARACTER		MT0ROD	OPERATION DETAILS

## Add occurrence MT0

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	206	MT0AOC	ADDED OCCURRENCE INFO
0	(0)	CHARACTER	30	MT0TXT	APPLICATION TEXT
30	(1E)	CHARACTER	8	MT0GRP	AUTHORITY GROUP
38	(26)	CHARACTER	16	MT0OID	APPLICATION OWNER
54	(36)	CHARACTER	30	MT0OTX	OWNER TEXT
84	(54)	CHARACTER	16	MT0CAL	CALENDAR NAME
100	(64)	CHARACTER	44	MT0ETTCRIT	ETT CRITERIA
144	(90)	CHARACTER	1	MT0ETTTYP	ETT TYPE J OR R
145	(91)	CHARACTER	8	MT0ETTJOB	ETT JOB NAME
153	(99)	CHARACTER	8	MT0ETTJID	ETT JOB ID
161	(A1)	SIGNED	1	MT0ETTGROOTL	ETT GDG ROOT LENGTH
162	(A2)	CHARACTER	44	MT0ETTEVNAM	COMPLETE ETT EVENT NAME
206	(CE)	CHARACTER		MT0AOD	OPERATION DETAILS, SEE DCLMTD

## Occurrence group process MT0

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	248	MT0GROUP	GROUP MT0
0	(0)	CHARACTER	4	MT0GROUPREQ	REQUEST TYPE, SEE CONSTANTS
4	(4)	CHARACTER	16	MT0GROUPID	NAME/REFERENCE OF THIS GROUP
20	(14)	CHARACTER	16	MT0GROUPCAL	GROUP CALENDAR
36	(24)	CHARACTER	4	MT0GROUPERR	ERROR RETURNED BY GROUP MCP
40	(28)	CHARACTER	4	MT0GROUPCAUSE	CAUSE OF ERROR SET BY MC0
44	(2C)	CHARACTER	196	MT0GROUPMT0	GLOBAL CHANGE DATA IN GROUP MANNER FOR ALL OCCS
240	(F0)	SIGNED	4	MT0GROUPNUM	NUMBER OF OCCS IN LIST
244	(F4)	BITSTRING	4	MT0GROUPFLAG	PROCESSING FLAGS - GROUP MT0
				MT0GROUPF_INIT	ON: LOGAHEAD RECORD FOR GROUP
				MT0GROUPF_WAIT	ON: WAIT FOR COMPLETION REQ
				MT0GROUPF_COMP	ON: THIS IS A COMPLETION REQ
				MT0GROUPF_ERR	ON: UPDATES FAILED
				MT0GROUPF_MT0	ON: INDUCED MT0S FOLLOWS
				MT0GROUPF_ADDC	ON: CANCELLED COMPL ADD
				MT0GROUPF_ADDD	ON: DELETE IN COMPL ADD
				MT0GROUPF_OPCT	ON: TERMINATED CONVERSAT
245	(F5)			MT0GROUPF_RDH	ON: SOME REL/DEL/HOLD FAILED
				MT0GROUPF_DEP	ON: RESOL DEPS GRP INTER - GLOBAL DATA CHANGES FLAGS
				MT0GROUPFC_G ROUP	ON: CHANGE GROUP DEF ID GLOBA
				MT0GROUPFC_IA	ON: CHANGE IA GLABALLY
				MT0GROUPFC_DL	ON: CHANGE DEADLINE GLOBAL
				MT0GROUPFC_PRI	ON: CHANGE PRIORITY GLOBAL

## MT0 - MCP tracking information entry

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				MT0GROUPFC_ERR	ON: CHANGE ERROR CODE GLOBBB
246	(F6)			MT0GROUPFC_JVT	ON: CHANGE JCL VAR TAB GLOB
				*	RESERVED
				*	RESERVED
				*	RESERVED
				*	RESERVED
				*	RESERVED
248	(F8)	CHARACTER		MT0GROUPEND	END OF HEADER

## Occurrence group process MT0

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	28	MT0GROUPLIST (*)	LIST OF OCC'S SUBJECT TO MT0 BASED ON END OF HEADER
0	(0)	CHARACTER	16	MT0GROUPOCC	OCCURRENCE AD NAME
16	(10)	CHARACTER	10	MT0GROUPIA	IA OF GROUP OCC
16	(10)	CHARACTER	6	MT0GROUPIADATE	INPUT ARRIVAL DATE
22	(16)	CHARACTER	4	MT0GROUPIATIME	INPUT ARRIVAL TIME
26	(1A)	CHARACTER	1	*	RESERVED
27	(1B)	BITSTRING	1	MT0GROUPOCCFLG	PROCESSING INDICATORS
				MT0GROUPOCC_BAD	ON: THIS OCC CAUSES ERROR
				MT0GROUPOCC_MT0	ON: SPECIFIC DIALOG MT0 FOLLOW
				MT0GROUPOCC_MOV	ON: OCC MODIFIED VS ADD MT0
				MT0GROUPOCC_DEL	ON: OCC IS DELETED VS ADD MT0
				MT0GROUPOCC_DEP	ON: OCC DEPENDENCIES IGNORED
				MT0GROUPOCC_UNR	ON: OCC DEPENDENCIES UNRESOLVED

## Cross reference

Name	Hex Offset	Hex Value	Level
MT0	0		1
MT0AERR	6	04	3
MT0AID	0		3
MT0AOC	0		1
MT0AOD	64		2
MT0AUTODEP	9	20	3
MT0BODY	29		2
MT0CAL	54		2
MT0CALLER	8		2
MT0CFLG2	55		2
MT0CHGALLMON	33	04	3
MT0CHK	6	80	3
MT0CMRER	9	08	3
MT0CONTINUED	6	08	3

## MT0 - MCP tracking information entry

Name	Hex Offset	Hex Value	Level
MT0CPE	A		2
MT0CPED	A		3
MT0CPET	10		3
MT0DATE	14		5
MT0DL	24		2
MT0DLD	24		3
MT0DLSET	33	40	3
MT0DLT	2A		3
MT0DRLAT	6	10	3
MT0DRLST	6	20	3
MT0ERR	2F		2
MT0ERROR	6	40	3
MT0ETTCRIT	64		2
MT0ETTEVNAM	A2		2
MT0ETTROOTL	A1		2
MT0ETTJID	99		2
MT0ETTJOB	91		2
MT0ETTYP	90		2
MT0EYE	0		2
MT0FLAGS	9		2
MT0FLAG3	28		2
MT0FLGS	6		2
MT0FOPD	6	01	3
MT0GR_ADD	9	02	3
MT0GROUP	0		1
MT0GROUPCAL	14		2
MT0GROUPCAUSE	28		2
MT0GROUPDEF	44		2
MT0GROUPEND	F8		2
MT0GROUPERR	24		2
MT0GROUPF_ADDC	F4	04	3
MT0GROUPF_ADDD	F4	02	3
MT0GROUPF_COMP	F4	20	3
MT0GROUPF_DEP	F5	40	3
MT0GROUPF_ERR	F4	10	3
MT0GROUPF_INIT	F4	80	3
MT0GROUPF_MT0	F4	08	3
MT0GROUPF_OPCT	F4	01	3
MT0GROUPF_RDH	F5	80	3
MT0GROUPF_WAIT	F4	40	3
MT0GROUPFC_DL	F5	08	3
MT0GROUPFC_ERR	F5	02	3
MT0GROUPFC_GROUP	F5	20	3
MT0GROUPFC_IA	F5	10	3
MT0GROUPFC_JVT	F5	01	3
MT0GROUPFC_PRI	F5	04	3
MT0GROUPFLAG	F4		2
MT0GROUPIA	10		2
MT0GROUPIADATE	10		3
MT0GROUPIATIME	16		3
MT0GROUPID	4		2

## MT0 - MCP tracking information entry

Name	Hex Offset	Hex Value	Level
MT0GROUPLIST	0		1
MT0GROUPM	33	01	3
MT0GROUPMT0	2C		2
MT0GROUPNUM	F0		2
MT0GROUPOCC	0		2
MT0GROUPOCC_BAD	1B	80	3
MT0GROUPOCC_DEL	1B	10	3
MT0GROUPOCC_DEP	1B	08	3
MT0GROUPOCC_MOV	1B	20	3
MT0GROUPOCC_MT0	1B	40	3
MT0GROUPOCC_UNR	1B	04	3
MT0GROUPOCCFLG	1B		2
MT0GROUPREQ	0		2
MT0GRP	1E		2
MT0HI_ADD	33	10	3
MT0HI_CHG	33	10	4
MT0IA	1A		2
MT0IAD	1A		3
MT0IAT	20		3
MT0IGNORE	9	04	3
MT0IM	10		3
MT0IMD	10		4
MT0IMSET	33	80	3
MT0IMT	16		4
MT0JVT	34		2
MT0KEY	0		2
MT0LGTH	1C		2
MT0MHELD	54	80	3
MT0MHELDV	54	40	3
MT0MIVLOFF	14		4
MT0MON	33	02	3
MT0MSGID	14		2
MT0MWS	8		2
MT0NOTLT	9	01	3
MT0OCC	0		1
MT0OCC TOK	20		2
MT0OCD	60		2
MT0OCFLG	33		2
MT0OCFLG1	54		2
MT0OID	26		2
MT0OTX	36		2
MT0PIFAD	6	02	3
MT0PRI	2E		2
MT0PSU_APPL	28	80	3
MT0REAS	33	20	3
MT0REP	4		2
MT0RESOLVE	9	10	3
MT0RESTART	9	40	3
MT0ROD	150		2
MT0RQSST	A		1
MT0RQSSTD	A		2



## MT0 - MCP tracking information entry

Name	Hex Offset	Hex Value	Level
MT0RQSSTT	E		2
MT0RSERR	8		2
MT0RSJOB	0		2
MT0RSPANEL	148		2
MT0RSREASON	1C		2
MT0RSTRT	0		1
MT0RSUSR	C		2
MT0STMP	14		3
MT0TIME	18		4
MT0TOLER	33	08	3
MT0TURNOV	9	80	3
MT0TWS	5	10	3
MT0TXT	0		2
MT0TYPE	7		2
MT0V_AWS	6		2
MT0V_LINK	A		2
MT0V_OPT	5		2
MT0V_OPT_FERR	5	40	3
MT0V_OPT_FLEAV	5	80	3
MT0V_OPT_FREST	5	20	3
MT0V_OPT_RIMMD	5	04	3
MT0V_OPT_RLEAV	5	10	3
MT0V_OPT_RRERU	5	08	3
MT0V_STAT	4		2
MT0V_VAR	B		2
MT0V_VAR_LINK	B	80	3
MT0V_VAR_STATUS	B	40	3
MT0V_WSN	0		2
MT0VARY	0		1
MT0VER	4		2
MT0W#I	6		2
MT0WCF	5		2
MT0WCP	5	80	3
MT0WC1	5	40	3
MT0WC2	5	20	3
MT0WS	0		1
MT0WSN	0		2
MT0XRERUN	28	02	3

## NJE - JES NJE record

Name : DCLNJE

Function:

This segment declares a JES NJE node name entry record in the scheduler Side information file (EQQSIDS)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	NJE	NJE NODE NAME RECORD
0	(0)	CHARACTER	64	NJEKEY	KEY

## NJE - JES NJE record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	1	NJETYPE	RECORD TYPE 4
1	(1)	CHARACTER	8	NJENAME	NAME OF JES NJE NODE
9	(9)	CHARACTER	55	*	RESERVED (ZEROES)
64	(40)	CHARACTER	16	NJEDATA	DATA
64	(40)	CHARACTER	4	NJEDESC	RECORD DESCRIPTOR = 'NJE '
68	(44)	CHARACTER	2	NJEVERS	RECORD VERSION = '01'
70	(46)	CHARACTER	1	NJEJES	JESTYPE 'A'='JES2 'B'='JES3
71	(47)	BITSTRING	1	*	RESERVED
72	(48)	CHARACTER	8	*	RESERVED
80	(50)	CHARACTER		NJEEND	END OF NJE

## Cross reference

Name	Hex Offset	Hex Value	Level
NJE	0		1
NJEDATA	40		2
NJEDESC	40		3
NJEEND	50		2
NJEJES	46		3
NJEKEY	0		2
NJENAME	1		3
NJETYPE	0		3
NJEVERS	44		3

## NMM - Normal mode manager parameters

Name : DCLNMM

Function:

This segment defines the Normal Mode Manager parameter block. The NMM block is created by the Normal Mode Manager task and is addressable from the MCA after NMM has started successfully.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	384	NMM	MANAGER BLOCK
0	(0)	CHARACTER	4	NMMDESC	BLOCK DESCRIPTOR = 'NMM '
4	(4)	CHARACTER	2	NMMVER	BLOCK MAPPING VERSION
6	(6)	BITSTRING	4	NMMFLAGS	NMM STATUS SWITCHES:
6	(6)	BITSTRING	1	NMMFLAG1	NMM STATUS FLAG1
				NMCPOPEN	CURRENT PLAN IS OPEN
				NMJSDOPEN	JS FILE IS OPEN
				NMLTOPEN	LTP FILE IS OPEN
				NMSIOPEN	SI FILE IS OPEN
				NMADOPEN	AD FILE IS OPEN
				NMJSCOPY	WILL COPY JS FILE
				NMBACKUP	WILL TAKE PLAN BACKUP
				NMTURNWSW	TURNOVER IN PROGRESS
7	(7)	BITSTRING	1	NMMFLAG2	NMM STATUS FLAG2
				NMRFRESH	REFRESH IS REQUESTED
				NMCPEQ	CP DATA SETS ARE EQUAL
				NMNCP	NCP TO BE COPIED

## NMM - Normal mode manager parameters

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				NMCPLOCK	CURRENT PLAN IS LOCKED
				NMCHLOCK	CHECKPOINT IS LOCKED
				NMMARACT	ON: AR IS ACTIVATED
				NMJSFORCE	FORCE COPY OF JS FILE
				NMMARC	ON: DO DATA STORE CLEAN UP OF HANGING JOBLOG REQUESTS (DCCLN)
8	(8)	BITSTRING	1	NMMFLAG3	NMM MSGEQQN051 REAS FLAG
				NMMLIM	BACKUP(NN) LIMIT REACHED
				NMMTO1	DP TURNOVER1 (START)
				NMMTO2	DP TURNOVER2 (END)
				NMMCMD	BACKUP CMD ISSUED
				NMMRST	NMM RECOVERY RESTART
				NMMSTOP	NMM NORMAL TERMINATION
				NMMJTE	JT I/O ERROR
				NMMEDP	EDP FULL
9	(9)	BITSTRING	1	NMMFLAG4	NMM STATUS FLAG 4
				NMCXOPEN	CURRENT PLAN EXT IS OPEN
				NMRDOPEN	CURRENT PLAN EXT IS OPEN
				NMLTLOCK	RESERVED
				NMADLOCK	RESERVED
				NMWSLOCK	RESERVED
				NMRDLOCK	RESERVED
				NMMSYMST	1=SYMPHONY IS ARRIVING
				NMOCXWSA	CHECK CX OPEN FLAG
10	(A)	CHARACTER	1	NMMSTAT	CONTAINS STATUS OF NMM
11	(B)	BITSTRING	2	NMMJTFLG	JT LOGGING FLAGS
				NMJTFIRST	WRITE 1ST RECORD ON JTLOG
				NMJTLAST	WRITE LAST RECORD ON JTLOG
				NMJTARCF	ARCHIVING FINISHED POSTED
				NMJTARCE	PERM ERROR ON ARCHIVE LOG
				NMJTEVCP	CP UPDATES ON JTLOG DS
				NMJTEVANY	JTLOG DS IS NOT EMPTY
				NMJTLOCK	JT ARCHIVE DS IS LOCKED
				NMJTIOER	WRITE ERROR RECOVERY IN PROGR
12	(C)			NMJTTURN	TURNOVER HAS BEEN REQUESTED
				NMJTAUXT	EXIT11 STATUS ACT-INACT
				NMSYMBACK	SYMPHONY RENEW BACKUP
				NMMMCP	TIE CHANGE FOR MCP
				NMMURGDQE	DO NOT SEND URG DQE
				*	FREE
13	(D)	BITSTRING	1	NMMNOERR	NOERROR PROCESSING FLAGS
				NMNOPROC	NOERROR PROCESSING REQUESTED
				NMNOMEMB	NOERROR MEMBER PROC REQSTD
				*	FREE
14	(E)	BITSTRING	1	NMMFLAG5	
				NMPROTDD	
				NMPROTDS	

## NMM - Normal mode manager parameters

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				NMTURN2SW	SYNCHRONIZATION REQUIRED WITH TIVOLI WORKLOAD SCHEDULER
				NMTWSF	SYNCHRONIZATION WITH TIVOLI WORKLOAD SCHEDULER FINISHED
				NMTWSYN	WAITING FOR SYNCHRONIZATION WITH TIVOLI WORKLOAD SCHEDULER
				NMRFRSYM	TIVOLI WORKLOAD SCHEDULER BEING STOPPED FOR REFRESH
				NMMSPECIAL	TIVOLI WORKLOAD SCHEDULER SPECIAL EVENT
				NMTWSQ	TIVOLI WORKLOAD SCHEDULER QUIT ENDED
15	(F)	CHARACTER	1	NMMTWSSTATUS	ENABLER STATUS QUEUE
NORMAL MODE MANAGER CONTROL BLOCK ADDRESSES FOLLOW					
16	(10)	ADDRESS	4	NMMMCA	MCA ADDRESS
20	(14)	ADDRESS	4	NMMCIOC	CHECKPOINT I/O COMM AREA
24	(18)	ADDRESS	4	NMMJTDCB	DCB ADDRESS, JT LOG FILE
28	(1C)	ADDRESS	4	NMMJTBUF	BUFFER ADDR CURR JT FILE
32	(20)	ADDRESS	4	NMMOPC	STATUS RECORD ADDRESS
36	(24)	ADDRESS	4	NMMHDR	CP HDR RECORD ADDRESS
40	(28)	ADDRESS	4	NMMEMP	EV MGR PARAMETER BLOCK
44	(2C)	ADDRESS	4	NMMCPCBUF	BUFFER ADDR CURR CP FILE
48	(30)	ADDRESS	4	NMMMJCJA	ADDR OF MCP JT EVENT
52	(34)	ADDRESS	4	NMMMCMTA	ADDR OF MT0 FOR MCP JT
56	(38)	ADDRESS	4	NMMEMDQP	EV MANAGER SUSPEND QUEUE
60	(3C)	ADDRESS	4	NMMJTABP	JTLOG FILE TABLE ADDR
64	(40)	ADDRESS	4	NMMSTEP	NMM SUBTASK ENTRY ADDR
68	(44)	ADDRESS	4	NMMXCM	XCM CACHE ADDRESS
72	(48)	ADDRESS	4	NMMDCXCM	CM XCM CACHE ADDRESS
76	(4C)	ADDRESS	4	NMMQRSP	RS MAIN BLOCK ADDRESS
80	(50)	ADDRESS	4	NMMRSPW	RS RECORD WORK AREA
84	(54)	ADDRESS	4	NMMJTBP	POINTER TO JTB
88	(58)	ADDRESS	4	NMMXDBUF	BUFFER ADDR CURR XD FILE
92	(5C)	SIGNED	4	NMMXDSIZ	XD RECORD FILE SIZE
96	(60)	SIGNED	4	* (1)	RESERVED
GENERAL PURPOSE FLAGS					
100	(64)	BITSTRING	4	NMMFLAG6	
		1... ..		NMJVOPEN	JV LOGICAL FILE OPEN
		.1.. ..		NMCLEAN	NMWRK CLEANUP
		..1. ....		NMMSYNCRVASKED	EM/RCVR SYNC ASKED
		...1 ....		NMMSYNCRVREC	EM/RCVR SYNC EVENT
				EIVED	
		.... 1...		NMMTNODEMSG	N127/N128 ISSUED
		.... .1..		NMMQDLOG	QDLOG FLAG
		.... ...1.		NMMBULK	BULKDISC EVENT
		.... ...1		NMMSCPOP	SCP OPEN BIT
101	(65)	1... ..		NMMSCPTOCLOSE	GOING TO CLOSE SCP
		.1.. ..		NMMBATCH2	
		..1. ....		NMXDOPEN	CURRENT XD IS OPEN
		...1 ....		NMXDPENDLT	ON: SOME XD02 PEND LTP
		.... 1...		NMXDPENDCP	ON: SOME XD02 PEND LTP

## NMM - Normal mode manager parameters

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
101	(65)	BITSTRING	2	*	FREE
VARIOUS ECBS FOR NMM AND ITS SUBTASKS FOLLOW					
104	(68)	BITSTRING	4	NMMARECB	AUTO RECOVERY ECB
108	(6C)	BITSTRING	4	NMMWAECB	WORKSTATION ANALYZER ECB
112	(70)	BITSTRING	4	NMMWECB	NMM WORK REQUIRED ECB
116	(74)	BITSTRING	4	NMMTMECB	NMM TIMER ECB
120	(78)	BITSTRING	4	NMMJTLOG	JTLOG ARCHIVING REQUIRED
124	(7C)	BITSTRING	4	NMMJTFIN	JTLOG ARCHIVING FINISHED
128	(80)	BITSTRING	4	NMMTWSECB	TIVOLI WORKLOAD SCHEDULER SYNCHRONIZATION ECB
132	(84)	BITSTRING	4	NMMTWSQUIT	TIVOLI WORKLOAD SCHEDULER IMMEDIATE STOP
NORMAL MODE MANAGER QUEUE AND CHAIN HEADERS FOLLOW					
136	(88)	ADDRESS	4	NMMAREAS	ADDR OF FIRST ALLOC AREA
140	(8C)	ADDRESS	4	NMMDOA1	ADDRESS OF FIRST DOA
144	(90)	ADDRESS	4	NMMWQA1	ADDRESS OF FIRST WQA
148	(94)	ADDRESS	4	NMMTJT1	ADDR OF DOA 1ST TIME JOB
152	(98)	ADDRESS	4	NMMQUE1	ADDR OF 1ST REQ QUE ENTRY
156	(9C)	ADDRESS	4	NMMDRA1	ADDRESS OF FIRST DRA
160	(A0)	ADDRESS	4	NMMDOAFR	FIRST FREE DOA
164	(A4)	ADDRESS	4	NMMWQAFR	FIRST FREE WQA
168	(A8)	ADDRESS	4	NMMQUEFR	FIRST FREE RES QUE ENTRY
172	(AC)	ADDRESS	4	NMMDRAFR	FIRST FREE DRA
176	(B0)	ADDRESS	4	NMMIVLFR	FIRST FREE IVL
180	(B4)	ADDRESS	4	NMMDSEFR	FIRST FREE DSEINFO
184	(B8)	BITSTRING	4	NMMSYNCEMRECEIVER	ECB EM/RCVR SYNC
188	(BC)	BITSTRING	4	NMMBULKSTARTEDECB	SYNCHR WITH MONITOR TASK
192	(C0)	ADDRESS	4	NMMTNOFR	FIRST FREE TIE NODE
196	(C4)	BITSTRING	4	* (9)	FREE
MISCELLANEOUS SAVED NMM VALUES					
232	(E8)	SIGNED	4	NMMJTNOT	TRACK ADDR LAST JT NOTE
236	(EC)	SIGNED	4	NMMJTBSZ	SIZE OF CURRENT JT BUFF
240	(F0)	SIGNED	4	NMMBSIZE	CURRENT PLAN RECORD SIZE
244	(F4)	CHARACTER	4	NMMBKPDT	DATE, 1ST EVENT AFTER BACKUP
248	(F8)	CHARACTER	4	NMMBKPTM	TIME, 1ST EVENT AFTER BACKUP
252	(FC)	SIGNED	4	NMMJSOPT	MAX JSFILE SIZE IN BYTES '-1' = AUTO COPY ACTIVE
256	(100)	SIGNED	4	NMMJSCAS	JS FILE CYLINDER SIZE
260	(104)	SIGNED	4	NMMJSCNT	NUM INSERTS ON JSFILE
264	(108)	SIGNED	4	NMMTQLIM	BACKUP TRK RECORDS LIMIT '-1' = AUTO BKP ACTIVE
268	(10C)	SIGNED	4	NMMTQTOT	TRK RECORDS SINCE BACKUP
272	(110)	CHARACTER	8	NMMTOKEN_FULL	OPERATION FULL TOKEN
272	(110)	CHARACTER	4	NMMTOKEN_PRE	PREFIX
276	114(	UNSIGNED	4	NMMTOKEN	OPCTOKEN
280	(118)	SIGNED	4	NMMJBUFZ	RESERVED
284	(11C)	SIGNED	4	NMMENQCNT	NUMBER OF ENQUEUE ATTEMPTS
288	(120)	SIGNED	2	NMMOPCSZ	SIZE OF STATUS REC BUFFER
290	(122)	SIGNED	2	NMMHDRSZ	SIZE OF CP HDR REC BUFFER
292	(124)	SIGNED	2	NMMDLFQ	NUMBER OF DLF ENQS
294	(126)	SIGNED	2	NMMNSUBS	NUMBER OF NMM SUBTASKS
296	(128)	CHARACTER	8	NMMERRNM	NOERROR PARMLIB MEMNAME
304	(130)	CHARACTER	64	NMMEXIT	TIMEREXIT

## NMM - Normal mode manager parameters

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
368	(170)	CHARACTER	4	NMMHTCP	POINTER TO HTC BLOCK
372	(174)	SIGNED	4	NMMHTCL	LENGHT OF HTC BLOCK
376	(178)	ADDRESS	4	NMMLSTTIEFP	POINTER TO LATE TIE CHAIN
380	(17C)	ADDRESS	4	NMMLSTTIELP	POINTER TO LAST LATE TIE
384	(180)	ADDRESS	4	NMMTNOFLP	POINTER TO FIRST LEAF TNODE
388	(184)	SIGNED	2	NMMLASTIPO	LAST INS TIE RELATIVE POS
390	(186)	SIGNED	2	NMMTNODENO	NBR OF TNODES
392	(188)	ADDRESS	4	NMMHTSP	POINTER TO HTS BLOCK
396	(18C)	SIGNED	4	NMMHTSL	LENGHT OF HTS BLOCK
400	(190)	CHARACTER	16	*	FREE
NORMAL MODE MANAGER CELL POOLS					
416	(1A0)	SIGNED	4	NMMTIEPID	TIME QUEUE CELL POOL ID
420	(1A4)	ADDRESS	4	NMMTIEPTR	ADDRESS OF FIRST TIE
424	(1A8)	ADDRESS	4	NMMDSRFR	FIRST FREE DSR INFO
428	(1AC)	CHARACTER	16	NMMTOKTCB	TCB TOKEN OF THE NMM TASK
444	(1BC)	CHARACTER	8	NMMDDMEM	PROTX COMMAND
452	(1C4)	CHARACTER	8	NMMDSMEM	PROTX COMMAND
460	(1CC)	CHARACTER	1	NMMASYMST	SYMPHONY ASYNCHRONOUS PHASE
461	(1CD)	CHARACTER	8	NMMSKIPMEM	SKIPINCL MEMBER NAME
469	(1D5)	CHARACTER	3	*	RESERVED
472	(1D8)	ADDRESS	4	NMMTNOFP	FIRST TIE NODE POINTER
SYSTEM AUTOMATION INFORMATION					
476	(1DC)	ADDRESS	4	NMMDSAFR	FIRST FREE DSAINFO
480	(1E0)	ADDRESS	4	NMMTNOLLP	POINTER TO LAST LEAF TNODE
484	(1E4)	ADDRESS	4	NMMCTOKEN	C INTERFACE TOKEN
488	(1E8)	CHARACTER	16	*	FREE
504	(1F8)	CHARACTER		NMMEND	END OF NMM BLOCK

## Cross reference

Name	Hex Offset	Hex Value	Level
NMADLOCK	9	10	4
NMADOPEN	6	08	4
NMBACKUP	6	02	4
NMCHLOCK	7	08	4
NMCPEQ	7	40	4
NMCPLOCK	7	10	4
NMCPOPEN	6	80	4
NMCXOPEN	9	80	4
NMCXUPDENQF	64	08	3
NMJSCOPY	6	04	4
NMJSFORCE	7	02	4
NMJSOPEN	6	40	4
NMJTARCE	B	10	3
NMJTARCF	B	20	3
NMJTAUXT	C	40	3
NMJTEVANY	B	04	3
NMJTEVCP	B	08	3
NMJTFIRST	B	80	3
NMJTIOER	B	01	3

## NMM - Normal mode manager parameters

Name	Hex Offset	Hex Value	Level
NMJTLAST	B	40	3
NMJTLOCK	B	02	3
NMJTURN	C	80	3
NMJVOPEN	64	80	3
NMLTLOCK	9	20	4
NMLTOPEN	6	20	4
NMM	0		1
NMMARACT	7	04	4
NMMARC	7	01	4
NMMAREAS	88		2
NMMARECB	68		2
NMMASYMST	170		2
NMMBKPDT	C8		2
NMMBKPTM	CC		2
NMMBSIZE	C4		2
NMMBULK	64	02	3
NMMBULKSTARTEDECB	BC		2
NMMCIOC	14		2
NMMCMD	8	10	4
NMMCPBUF	2C		2
NMMCPTOCLOSE	65		3
NMMDCXCM	48		2
NMMDDMEM	160		2
NMMDESC	0		2
NMMDLFQ	F8		2
NMMDOAFR	A0		2
NMMDOA1	8C		2
NMMDRAFR	AC		2
NMMDRA1	9C		2
NMMDSAFR	1DC		2
NMMDSEFR	B4		2
NMMDSMEM	1C4		2
NMMDSRFR	1A8		2
NMMEDP	8	01	4
NMMEMDQP	38		2
NMMEMP	28		2
NMMEND	180		2
NMMENQCNT	F0		2
NMMERRNM	FC		2
NMMEXIT	104		2
NMMFLAGS	6		2
NMMFLAG1	6		3
NMMFLAG2	7		3
NMMFLAG3	8		3
NMMFLAG4	9		3
NMMFLAG5	E		2
NMMFLAG6	64		2
NMMHDR	24		2
NMMHDRSZ	F6		2
NMMHTCL	174		2
NMMHTCP	170		2

## NMM - Normal mode manager parameters

Name	Hex Offset	Hex Value	Level
NMMHTSL	18C		2
NMMHTSP	188		2
NMMIVLFR	B0		2
NMMJBUFZ	EC		2
NMMJSCAS	D4		2
NMMJSCNT	D8		2
NMMJSOPT	D0		2
NMMJTABP	3C		2
NMMJTBSZ	C0		2
NMMJTBUF	1C		2
NMMJTDCB	18		2
NMMJTE	8	02	4
NMMJTFIN	7C		2
NMMJTFLG	B		2
NMMJTLOG	78		2
NMMJTNOT	BC		2
NMMLASTIPO	184		2
NMMLIM	8	80	4
NMMLSTTIEFP	178		2
NMMLSTTIELP	17C		2
NMMMCA	10		2
NMMMJCJA	30		2
NMMMCMTA	34		2
NMMMCP	C		3
NMMNOERR	D		2
NMMNSUBS	FA		2
NMMOPC	20		2
NMMOPCSZ	F4		2
NMMQDLOG	64	04	3
NMMQRSP	4C		2
NMMQUEFR	A8		2
NMMQUE1	98		2
NMMRST	8	08	4
NMMRSWP	50		2
NMMSCPOP	64	01	3
NMMSCPOPTOCLOSE	65	80	3
NMMSKIPMEM	1CD		2
NMMSPECIAL	E	02	3
NMMSTAT	A		2
NMMSTEP	40		2
NMMSTOP	8	04	4
NMMSYMST	9	02	4
NMMSYNCEMRECEIVER	184		2
NMMSYNCRCVASKED	100	20	3
NMMSYNCRCVRECEIVED	100	10	3
NMMTIEPID	144		2
NMMTIEPTR	148		2
NMMTJT1	94		2
NMMTMECB	74		2
NMMTNODEMSG	64	08	3
NMMTNODENO	186		2



## NMM - Normal mode manager parameters

Name	Hex Offset	Hex Value	Level
NMMTNOFLP	180		2
NMMTNOFP	1D0		2
NMMTNOFR	C0		2
NMMTNOLLP	1E0		2
NMMTOKEN	E8		3
NMMTOKEN_FULL	E4		2
NMMTOKEN_PRE	E4		3
NMMTOKTCB	150		2
NMMTO1	8	40	4
NMMTO2	8	20	4
NMMTQLIM	DC		2
NMMTQTOT	E0		2
NMMTWSECB	80		2
NMMTWSQUIT	84		2
NMMTWSSTATUS	F		2
NMMURGDQE	C	08	3
NMMVER	4		2
NMMWAECB	6C		2
NMMWECB	70		2
NMMWQAFR	A4		2
NMMWQA1	90		2
NMMXCM	44		2
NMMXDBUF	58		2
NMMXDSIZ	5C		2
NMNCP	7	20	4
NMNOMEMB	D	40	3
NMNOPROC	D	80	3
NMOCXWSA	9	01	4
NMPROTDD	E	80	3
NMPROTDS	E	40	3
NMRDLOCK	9	04	4
NMRDOPEN	9	40	4
NMRFRESH	7	80	4
NMRFRSYM	E	04	3
NMSIOPEN	6	10	4
NMSKIPIN	D	01	3
NMSYMBACK	C	20	3
NMTURNSW	6	01	4
NMTURN2SW	E	20	3
NMTWSF	E	10	3
NMTWSQ	E	01	3
NMTWSYN	E	08	3
NMWSLOCK	9	08	4
NMXDOPEN	65	20	3
NMXDPENDCP	65	08	3
NMXDPENDLT	65	10	3

## NNN - Node name record

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### NNN - Node name record

Name : DCLNNN

Function:

This segment declares the scheduler node name checkpoint record. This record is always the second record on the first track of the checkpoint data set.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	8024	NNN	NODE NAME RECORD
0	(0)	CHARACTER	4	NNNDESC	BLOCK DESCRIPTOR = 'NNN '
4	(4)	CHARACTER	2	NNNVER	BLOCK MAPPING VERSION
6	(6)	BITSTRING	2	*	RESERVED
8	(8)	SIGNED	4	NNNNODES	NUMBER OF NODES IN RECORD
12	(C)	SIGNED	4	* (3)	RESERVED (INIT TO ZERO)
24	(18)	CHARACTER	8	NNNNAMES (1000)	KNOWN NODE NAMES
8024	(1F58)	CHARACTER		NNNEND	END OF NNN

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### OPC - OPCSTAT record

Name : DCLOPC

Function:

This is the OPCSTAT record mapping. This record is first in the checkpoint data set.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	104	OPCSTAT	STATUS RECORD
0	(0)	CHARACTER	10	OPCKEY	KEY ALWAYS='0000000000'
10	(A)	CHARACTER	6	*	RESERVED
16	(10)	SIGNED	2	OPC#REPL	NUMBER OF REPLANS SINCE LAST PLAN NEXT
18	(12)	CHARACTER	10	OPCDPEN	DP PLAN PERIOD END
18	(12)	CHARACTER	6	OPCDPEND	DP PLAN PERIOD END DATE
24	(18)	CHARACTER	4	OPCDPENT	DP PLAN PERIOD END TIME
28	(1C)	CHARACTER	8	OPCCPDDN	CURRENT PLAN DDN
36	(24)	CHARACTER	8	OPCOCRDD	OLD CURRENT PLAN DDN
44	(2C)	CHARACTER	2	OPCJTCLR	CURRENT JTLOG NUMBER
46	(2E)	CHARACTER	2	OPCJTARC	LAST ARCHIVED JTLOG
48	(30)	CHARACTER	2	OPCJTMAX	MAX JTLOG NUMBER
50	(32)	CHARACTER	1	OPCJTOPE	ARCHIVE JTLOG OPEN
51	(33)	CHARACTER	1	OPCSYMRP	SYMPHONY AFTER REFRESH
52	(34)	CHARACTER	8	*	RESERVED
60	(3C)	CHARACTER	1	OPCCP	CURRENT PLAN EXISTS, Y N
61	(3D)	CHARACTER	1	OPCJTDL	BACKUP JT CREATED, Y N
62	(3E)	CHARACTER	1	OPCTUNCP	TURNOVER FLAG
63	(3F)	CHARACTER	8	OPCCURJS	DDN FOR JSFILE IN USE
71	(47)	CHARACTER	1	OPCBACKINGUP	BACKUP STARTED Y N
72	(48)	CHARACTER	10	OPCLEVEL	CKPT BLOCK CODE LEVEL
72	(48)	CHARACTER	2	OPCVER	BLOCK MAPPING VERSION
74	(4A)	CHARACTER	8	OPCFMID	TRACKER FMID
82	(52)	CHARACTER	1	OPCCKPTR	CKPT REFRESH Y N

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
84	(54)	SIGNED	4	OPCSYMRUNNUM	SYMPHONY CURRENT RUN NUMBER
88	(58)	CHARACTER	1	OPCTUNSYM	SYMPHONY TURNOVER FLAG
89	(59)	CHARACTER	1	OPCTWSYN	Y=TIVOLI WORKLOAD SCHEDULER MACRO FAILED
90	(5A)	CHARACTER	1	OPCTUNASYM	SYMPHONY TURNOVER ASYNCHR
91	(5B)	CHARACTER	1	OPCTWSJBNM	TWSJOBNAME IN JTOPTS 'O' = OCCNAME 'E' = EXTNAME 'X' = EXTNOCC 'J' = JOBNAME
92	(5C)	SIGNED	2	OPCSUPOL	SUPPRESS POLICY FROM OPT
94	(5E)	BITSTRING	2	OPCFLAGS	BIT BATTERY
		1... ..	2	OPCNOPTIME	TOPOLOGY NOPTIMEDEP
94	(5E)	BITSTRING	1	*	FREE
96	(60)	CHARACTER	8	*	FREE

### Cross reference

Name	Hex Offset	Hex Value	Level
OPC#REPL	10		2
OPCBACKINGUP	47		2
OPCCKPTR	52		2
OPCCP	3C		2
OPCCPDDN	1C		2
OPCCURJS	3F		2
OPCDPEN	12		2
OPCDPEND	12		3
OPCDPENT	18		3
OPCFLAGS	5E		2
OPCFMID	4A		3
OPCJTARC	2E		2
OPCJTCUR	2C		2
OPCJTDL	3D		2
OPCJTMAX	30		2
OPCJTOPE	32		2
OPCKEY	0		2
OPCLEVEL	48		2
OPCNOPTIME	5E	80	3
OPCOCPDD	24		2
OPCSTAT	0		1
OPCSUPOL	5C		2
OPCSYMRF	33		2
OPCSYMRUNNUM	54		2
OPCTUNASYM	5A		2
OPCTUNCP	3E		2
OPCTUNSYM	58		2
OPCTWSJBNM	5B		2
OPCTWSYN	59		2
OPCVER	48		3

## OPERR - Ops in error report record in DP

Name : DCLOPERR

Function:

Describes layout of oper in error records representing report data on occurrences which have one/more operations in error, when the last back-up of current plan was created. The records have the standard recsize and keysize of DPIN records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	266	OPEAREA	OPE RECORD
0	(0)	CHARACTER	114	OPEKEY	KEY
0	(0)	SIGNED	2	OPETYPE	TYPE IS ALWAYS 6
2	(2)	CHARACTER	2	*	ADJUST TO ADID OFFS
4	(4)	CHARACTER	34	*	ADJUST KEY SIZE
38	(26)	CHARACTER	26	OPEOCC	OCCURANCE IDENTIFICATION
38	(26)	CHARACTER	16	OPEADID	APPLICATION IDENTIFICATION
54	(36)	CHARACTER	10	OPEOPIA	PLANNED OCC INPUT ARRIVAL
54	(36)	CHARACTER	6	OPEOPIAD	DAY (YYMMDD)
54	(36)	CHARACTER	4	OPEOPIAY	
58	(3A)	CHARACTER	2	OPEOPIAE	( DD)
60	(3C)	CHARACTER	4	OPEOPIAT	TIME (HHMM)
60	(3C)	CHARACTER	2	OPEOPIAH	TIME (HH )
62	(3E)	CHARACTER	2	OPEOPIAM	TIME ( MM)
64	(40)	CHARACTER	7	OPEWSID	WSID OF OPERATION
64	(40)	CHARACTER	3	OPEWSIDN	OPERATION NUMBER
67	(43)	CHARACTER	4	OPEWSIDS	WORKSTATION NAME
71	(47)	CHARACTER	43	*	TO FILL UP THE KEY
114	(72)	CHARACTER	152	OPEDATA	DATA PART OF OPE RECORD
114	(72)	CHARACTER	24	OPEOTXT	APPLICATION TEXT
138	(8A)	CHARACTER	1	OPEOPRI	PRIORITY
139	(8B)	CHARACTER	10	OPEOAI A	ACTUAL OCC INPUT ARRIVAL
139	(8B)	CHARACTER	6	OPEOAIAD	DAY (YYMMDD)
139	(8B)	CHARACTER	4	OPEOAIAY	(YYMM )
143	(8F)	CHARACTER	2	OPEOIAE	( DD)
145	(91)	CHARACTER	4	OPEOAIAT	TIME (HHMM)
145	(91)	CHARACTER	2	OPEOIAH	TIME (HH )
147	(93)	CHARACTER	2	OPEOIAM	TIME ( MM)
149	(95)	CHARACTER	10	OPEOPC	PLANNED OCC. COMPLETION
149	(95)	CHARACTER	6	OPEOPCDT	DAY (YYMMDD)
149	(95)	CHARACTER	4	OPEOPCY	(YYMM )
153	(99)	CHARACTER	2	OPEOPCD	( DD)
155	(9B)	CHARACTER	4	OPEOPCT	TIME (HHMM)
155	(9B)	CHARACTER	2	OPEOPCH	TIME (HH )
157	(9D)	CHARACTER	2	OPEOPCM	TIME ( MM)
159	(9F)	CHARACTER	24	OPEOPTXT	OPERATION TEXT
183	(B7)	CHARACTER	8	OPEJBNM	JOBNAME
191	(BF)	CHARACTER	10	OPESPIA	SPECIFIC OPER INPUT ARR.
191	(BF)	CHARACTER	6	OPESPIAD	DAY (YYMMDD)   BLANK
191	(BF)	CHARACTER	4	OPESPIAY	(YYMM )
195	(C3)	CHARACTER	2	OPESPIAE	( DD)
197	(C5)	CHARACTER	4	OPESPIAT	TIME (HHMM)   BLANK
197	(C5)	CHARACTER	2	OPESPIAH	TIME (HH )
199	(C7)	CHARACTER	2	OPESPIAM	TIME ( MM)

## OPERR - Ops in error report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
201	(C9)	CHARACTER	10	OPEPAIA	ACTUAL OPER INPUT ARRIVAL
201	(C9)	CHARACTER	6	OPEPAIAD	DAY (YYMMDD)
201	(C9)	CHARACTER	4	OPEPAIAY	(YYMM )
205	(CD)	CHARACTER	2	OPEPAIAE	( DD)
207	(CF)	CHARACTER	4	OPEPAIAT	TIME (HHMM)
207	(CF)	CHARACTER	2	OPEPAIAH	TIME (HH )
209	(D1)	CHARACTER	2	OPEPAIAM	TIME ( MM)
211	(D3)	CHARACTER	10	OPEPPC	LATEST OUT
211	(D3)	CHARACTER	6	OPEPPCDT	DAY (YYMMDD)
211	(D3)	CHARACTER	4	OPEPPCY	(YYMM )
215	(D7)	CHARACTER	2	OPEPPCD	( DD)
217	(D9)	CHARACTER	4	OPEPPCT	TIME (HHMM)
217	(D9)	CHARACTER	2	OPEPPCH	TIME (HH )
219	(DB)	CHARACTER	2	OPEPPCM	TIME ( MM)
221	(DD)	CHARACTER	10	OPEPSC	SPECIFIC OPER COMPLETION
221	(DD)	CHARACTER	6	OPEPSCT	DAY (YYMMDD)   BLANK
221	(DD)	CHARACTER	4	OPEPSCY	(YYMM )
225	(E1)	CHARACTER	2	OPEPSCD	( DD)
227	(E3)	CHARACTER	4	OPEPACT	TIME (HHMM)   BLANK
227	(E3)	CHARACTER	2	OPEPSCH	TIME (HH )
229	(E5)	CHARACTER	2	OPEPSCM	TIME ( MM)
231	(E7)	CHARACTER	4	OPEODUR	OPERATION DURATION
231	(E7)	CHARACTER	2	OPEODURH	TIME (HH )
233	(E9)	CHARACTER	2	OPEODURM	( MM)
235	(EB)	CHARACTER	10	OPEERR	TIME FOR OPER ERROR
235	(EB)	CHARACTER	6	OPEERRDT	DAY (YYMMDD)
235	(EB)	CHARACTER	4	OPEERRY	(YYMM )
239	(EF)	CHARACTER	2	OPEERRD	( DD)
241	(F1)	CHARACTER	4	OPEERRT	TIME (HHMM)
241	(F1)	CHARACTER	2	OPEERRTH	TIME (HH )
243	(F3)	CHARACTER	2	OPEERRTM	TIME ( MM)
245	(F5)	CHARACTER	4	OPEOPERR	OPERATION ERROR CODE
249	(F9)	CHARACTER	16	OPEOPUDATA	OPERATION USERDATA
265	(109)	CHARACTER	1	OPECMSTAT	CAT MGT STATUS

## Cross reference

Name	Hex Offset	Hex Value	Level
OPEADID	26		4
OPEAREA	0		1
OPECMSTAT	109		3
OPEDATA	72		2
OPEERR	EB		3
OPEERRD	EF		5
OPEERRDT	EB		4
OPEERRT	F1		4
OPEERRTH	F1		5
OPEERRTM	F3		5
OPEERRY	EB		5
OPEJBNM	B7		3
OPEKEY	0		2
OPEOAI	8B		3

## OPERR - Ops in error report record in DP

Name	Hex Offset	Hex Value	Level
OPEOAIAD	8B		4
OPEOIAIE	8F		5
OPEOIAIH	91		5
OPEOAIAM	93		5
OPEOAIAT	91		4
OPEOAIAY	8B		5
OPEOCC	26		3
OPEODUR	E7		3
OPEODURH	E7		4
OPEODURM	E9		4
OPEOPC	95		3
OPEOPCD	99		5
OPEOPCDT	95		4
OPEOPCH	9B		5
OPEOPCM	9D		5
OPEOPCT	9B		4
OPEOPCY	95		5
OPEOPERR	F5		3
OPEOPIA	36		4
OPEOPIAD	36		5
OPEOPIAE	3A		6
OPEOPIAH	3C		6
OPEOPIAM	3E		6
OPEOPIAT	3C		5
OPEOPIAY	36		6
OPEOPRI	8A		3
OPEOPTXT	9F		3
OPEOPUDATA	F9		3
OPEOTXT	72		3
OPEPACT	E3		4
OPEPAIA	C9		3
OPEPAIAD	C9		4
OPEPAIAE	CD		5
OPEPAIAH	CF		5
OPEPAIAM	D1		5
OPEPAIAT	CF		4
OPEPAIAY	C9		5
OPEPPC	D3		3
OPEPPCD	D7		5
OPEPPCDT	D3		4
OPEPPCH	D9		5
OPEPPCM	DB		5
OPEPPCT	D9		4
OPEPPCY	D3		5
OPEPSC	DD		3
OPEPSCD	E1		5
OPEPSCH	E3		5
OPEPSCM	E5		5
OPEPSCT	DD		4
OPEPSCY	DD		5
OPESPIA	BF		3

## OPERR - Ops in error report record in DP

Name	Hex Offset	Hex Value	Level
OPESPIAD	BF		4
OPESPIAE	C3		5
OPESPIAH	C5		5
OPESPIAM	C7		5
OPESPIAT	C5		4
OPESPIAY	BF		5
OPETYPE	0		3
OPEWSID	40		3
OPEWSIDN	40		4
OPEWSIDS	43		4

## OPI - Operator instruction

Name : DCLOPI

Function:

This segment declares an operator instruction record, physically located in EQQOIDS.

If the valid\_from key is blank and the valid\_to key is set to the highest value (all hexadecimal 'F'), the operator instruction is called 'permanent', else it is called 'temporary'.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	OPI	
0	(0)	CHARACTER	78	OPIBODY	
0	(0)	CHARACTER	28	OPIKEY	
0	(0)	CHARACTER	18	OPIADOP	
0	(0)	CHARACTER	16	OPIADID	APPLICATION NAME
16	(10)	SIGNED	2	OPIOPNO	OPERATION NUMBER
18	(12)	CHARACTER	10	OPIVALTO	VALID TO DATE+TIME
18	(12)	CHARACTER	6	OPIVALT1	DATE
24	(18)	CHARACTER	4	OPIVALT2	TIME
28	(1C)	CHARACTER	4	OPIEYE	EYE CATCHER
32	(20)	UNSIGNED	1	OPIVERS	VERSION NUMBER
33	(21)	CHARACTER	10	OPIVALFR	VALID FROM DATE+TIME
33	(21)	CHARACTER	6	OPIVALF1	DATE
39	(27)	CHARACTER	4	OPIVALF2	TIME
43	(2B)	CHARACTER	4	OPIWSID	NOT USED
47	(2F)	CHARACTER	8	OPIOWNER	LAST UPDATE USER
55	(37)	CHARACTER	10	OPIUPDAT	LAST UPDATE, DATE+TIME
55	(37)	CHARACTER	6	OPIUPDT1	DATE
61	(3D)	CHARACTER	4	OPIUPDT2	TIME
65	(41)	CHARACTER	1	OIFLAGS	FLAGS
				OPIINAC	DO NO CHECK AGAINST AD
				OPIBEING	UNDER CREATION
66	(42)	CHARACTER	2	*	FREE
68	(44)	CHARACTER	8	OPILOTS	LAST UPDATE TIMESTAMP
76	(4C)	SIGNED	2	OPILINES	NUMBER OF LINES COMING
78	(4E)	CHARACTER	72	OPITAB (*)	1 LINE WITH OPERATOR INSTR.

## OPI - Operator instruction

### Cross reference

Name	Hex Offset	Hex Value	Level
OIFLAGS	41		3
OPI	0		1
OPIADID	0		5
OPIADOP	0		4
OPIBEING	41	40	4
OPIBODY	0		2
OPIEYE	1C		3
OPIKEY	0		3
OPI LINES	4C		3
OPI LUTS	44		3
OPINAC	41	80	4
OPIOPNO	10		5
OPIOWNER	2F		3
OPITAB	4E		2
OPIUPDAT	37		3
OPIUPDT1	37		4
OPIUPDT2	3D		4
OPIVALFR	21		3
OPIVALF1	21		4
OPIVALF2	27		4
OPIVALTO	12		4
OPIVALT1	12		5
OPIVALT2	18		5
OPIVERS	20		3
OPIWSID	2B		3

## OPT - Subsystem options

Name : DCLOPT

Function:

This segment declares options and parameter values supplied to the subsystem through init statements.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	648	OPT	OPTIONS BLOCK
0	(0)	CHARACTER	4	OPTDESC	BLOCK DESCRIPTOR = 'OPT '
4	(4)	CHARACTER	2	OPTVER	BLOCK MAPPING VERSION
6	(6)	BITSTRING	4	OPTFLAGS	YES/NO TYPE OPTIONS
				OPTHOST	1: THIS IS AN HOST
				OPTSTBY	1: THIS IS A STANDBY SYSTEM
				OPTNEC	1: START A NEC TASK
				OPTEWTR	1: START AN EVENT WTR
				OPTJCC	1: START A JCC TASK
				OPTRCVY	1: START A RECOVERY TASK
				OPTJSUB	1: THE SCHEDULER WILL SUBMIT JOBS
				OPTNPRT	1: DON'T COMPL PRT OPERS
7	(7)			OPTEVMS	1: CREATE EVENT STATISTICS



## OPT - Subsystem options

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				OPTKSRX	1: KEEP EXCL RESRC
				OPTKSRS	1: KEEP SHRD RESRC
				OPTOSUB	1: TRACK ONLY OPCSUBMIT JOBS
				OPTJOPT	1: TRACK OPCSUBMIT + OTHERS
				OPTSBNO	1: NO JOBCARD CHECK
				OPTSBOK	1: SUBMIT ONLY OK JOBS
				OPTGSMS	1: MEASURE GS REQUESTS
8	(8)			OPTCPNEW	1: CURRPLAN(NEW) SPECIFIED
				OPTCPMS	1: CREATE CP ENQ STATISTICS
				OPTAPPC	1: START AN APPC TASK
				OPTDUAL	1: DUAL JT LOGGING
				OPTRES	1: RESTART/BLANK OPR VAL
				OPTIALLY	1: OPERIALL(Y)
				OPTDALLY	1: OPERDALL(Y)
				OPTSIM	1: SIMULATE MODE
9	(9)			OPTSYSF	1: TAKEOVER IF HOST SYS FAIL
				OPTHOSTF	1: TAKEOVER IF HOST SCHEDULER FAIL
				OPTACCT	1: ACCOUNT IS REQD IN JOBCD
				OPTPGMR	1: PROG NM IS REQD IN JOBCD
				OPTDB2	1: DB2 IS USED FOR MODEL DB
				OPTRER	1: REROUTE/BLANK OPR VAL
				OPTSSXB	1: SSX BUILD REQUESTED
				OPTSSXBM	1: SSX MERGE REQUESTED
10	(A)	BITSTRING	2	OPTFLAG2	YES/NO TYPE OPTIONS
				OPTSSCMP	1: LOAD SSCM PERMANENT
				OPTRODM	1: START A RODM TASK
				OPTDYNEV	1: DYNADD RES AT EVENT
				OPTDYNSU	1: DYNADD RES AR SUBMIT
				OPTAPDST	1: APPC DESTS EXIST
				OPTPLEX	1: PLEX CONFIGURATION
				OPTSERVER	1: A SERVER
				OPTWSMS	1: WSA STATS ON/OFF
11	(B)			OPTPROC	1: PROC SUBSTITUTION
				OPTVFAIL	1: VARSUB FAIL IGNORE
				OPTFLTASK	1: FL TASK ACTIVE
				OPTSPIN	1: SPIN(YES) 0: SPIN(NO)
				*	FREE
				OPTARM	SYSPLEX ARM REQUEST
				OPTTPLGY	TOPOLOGY IS PRESENT
				OPTXTMON	EXT MON ACTIVE Y N
				OPTNGENS	1=DO NOT DO GEN SEARCH
12	(C)	CHARACTER	1	OPTONCOMPL	ONCOMPLETE Y=SET TO YES N=SET TO NO R=RESET TO BLANK <BLANK>=DO NOTHING

## OPT - Subsystem options

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
13	(D)	CHARACTER	1	OPTDYNONCO	DYNONCOMPLETE Y=SET TO YES N=SET TO NO R=RESET TO BLANK <BLANK>=DO NOTHING
14	(E)	BITSTRING	1	OPTFLAG4	ADDITIONAL FLAGS
		11.. ....		OPTAUDCP	AUDITCP STATEMENT
		1... ....		OPTCOND	1: LOG COND STATUS CHANGE
		.1.. ....		OPTCDEP	1: LOG CDEP STATUS CHANGE
		..1. ....		OPTETTNEW	1: ETT DEP FROM ETTYTCR1
		...1 ....		OPTCNDSUB	1: COND S ON SUBMISSION
		.... 1111		*	
16	(10)	UNSIGNED	2	OPTX01SZ	EXIT01 JCL SIZE
18	(12)	BITSTRING	2	OPTXITFL	USER EXIT FLAG. 1: CALL EXIT NOTE: BIT 1 IS FOR EXIT 00
20	(14)	SIGNED	4	OPTBACK	NMM BACKUP FREQUENCY '-1' = AUTO BKP ^ACTIVE
24	(18)	SIGNED	4	OPTNRDR	NUMBER OF EVENT READERS
28	(1C)	SIGNED	4	OPTABNUM	NUM NO ERROR RETCODES
32	(20)	SIGNED	4	OPTARNUM	NUM RESET ERROR RETCODES
36	(24)	SIGNED	4	OPTHRCNR	HIGHEST OK RETCODE
40	(28)	SIGNED	4	OPTMAXJS	MAX JS-FILE SIZE '-1' = AUTO COPY ^ACTIVE
44	(2C)	SIGNED	4	OPTSTME	SIMULATE END TIME
48	(30)	SIGNED	4	OPTSTMS	SIMULATE START TIME
52	(34)	SIGNED	4	OPTOFF_DLY	WS OFFLINE ACTIONS DELAY
56	(38)	ADDRESS	4	OPTJDESTP	JOBLOG DEST PARMS
60	(3C)	SIGNED	4	OPTRSCONT	CONTENTIONTIME
64	(40)	ADDRESS	4	OPTAWSTB	APPC WS table
68	(44)	SIGNED	4	OPTTCPPORT	LOCAL TCP/IP PORT
72	(48)	CHARACTER	8	OPTTCPID	LOCAL TCP/IP ID
80	(50)	ADDRESS	4	OPTHISTP	ADDR OF HISTORY BLOCK
84	(54)	ADDRESS	4	OPTABPTR	ADDRESS OF NO ERROR TABLE
88	(58)	ADDRESS	4	OPTARPTR	ADDRESS OF RESET ERR TBL
92	(5C)	ADDRESS	4	OPTDTPTR	ADDR OF DESTINATION TAB
96	(60)	ADDRESS	4	OPTSIDP	ADDR OF SYSTEM ID TAB
100	(64)	ADDRESS	4	OPTSRVSPTR	TO SERVER NAMES
104	(68)	CHARACTER	8	OPTNCFNM	NCF APPLICATION NAME
112	(70)	CHARACTER	8	OPTMIRRD	REMOTE STANDBY DESTINATION
120	(78)	CHARACTER	8	OPTJCCNM	JCC INIT MEMBER NAME
128	(80)	CHARACTER	8	OPTWTRNM	EWTR INIT MEMBER NAME
136	(88)	CHARACTER	8	OPTRDRNM (16)	ERDR INIT MEMBER NAMES
264	(108)	CHARACTER	8	OPTXITNM (16)	USER EXIT LOAD MODULE NAMES NOTE: 1ST ENTRY IS FOR EXIT0
392	(188)	CHARACTER	8	OPTARNM	AR INIT MEMBER NAME
400	(190)	CHARACTER	8	OPTSSCMN	SSCM LOAD MODULE NAME
408	(198)	CHARACTER	8	OPTGROUP	XCF GROUP NAME
416	(1A0)	CHARACTER	16	OPTMEM	XCF MEMBER NAME
432	(1B0)	CHARACTER	16	OPTGTAB	NAME OF GLOBAL JCL VARTAB
448	(1C0)	CHARACTER	16	OPTCALNM	NAME OF DEFAULT CALENDAR
464	(1D0)	BITSTRING	1	OPTAUDIT(16)	AUDIT SPECIFICATIONS
				OPTTRACK	AUDIT THIS RESOURCE

## OPT - Subsystem options

Offsets		Type	Len	Name (Dim)	Description	
Dec	Hex					
				OPTREAD	AUDIT READ ACCESSES	
				OPTDATA	LOG ENTIRE VSAM RECORD	
480	(1E0)	SIGNED	2	OPTQLEN	MAX QUEUE LENGTH	
482	(1E2)	SIGNED	2	OPTADSMF	AD SMOOTHING FACTOR	
484	(1E4)	SIGNED	2	OPTADLIM	AD LIMIT FOR FEEDBACK	
486	(1E6)	SIGNED	2	OPTOPITM	NUMBER DAYS OP INST IS NEW	
488	(1E8)	SIGNED	2	OPTGSTASK	NUMBER OF GS TASKS	
490	(1EA)	SIGNED	2	OPTPLAN	DEFAULT DP PERIOD START	
492	(1EC)	CHARACTER	1	OPTVSUB	VAR SUBSTITUTION Y N S	
493	(1ED)	CHARACTER	1	OPTONODE	OUTPUTNODE F=FINAL A=ANY	
494	(1EE)	SIGNED	2	OPTSUPOL	SUPPRESSPOLICY VALUE	
496	(1F0)	SIGNED	2	OPTSHPOL	SHUTDOWNPOLICY VALUE	
498	(1F2)	CHARACTER	1	OPTSUPPL	SUPPRESSACTION CHAR	
499	(1F3)	CHARACTER	1	OPTSFAIL	SUBFAILURE ACTION CHAR	
500	(1F4)	SIGNED	2	OPTJTLOG	NUMBER OF JTLOGS	
502	(1F6)	SIGNED	2	OPTOVERC	PS OVERCOMIT	
504	(1F8)	SIGNED	2	OPTPULSE	PULSE RATE	
506	(1FA)	SIGNED	2	OPTTIMEOUT	TCP TIMEOUT INTERVAL	
508	(1FC)	CHARACTER	3	OPTWSFAIL	WS FAILURE OPTIONS	
508	(1FC)	CHARACTER	1	OPWSFAIL_SACT	RESTART OPTION	
509	(1FD)	CHARACTER	1	OPWSFAIL_RACT	REROUTE OPTION	
510	(1FE)	CHARACTER	1	OPWSFAIL_AACT	AVAILABLE OPTION	
511	(1FF)	CHARACTER	3	OPTWSOFFL	WS OFFLINE OPTIONS	
511	(1FF)	CHARACTER	1	OPWSOFFL_SACT	RESTART OPTION	
512	(200)	CHARACTER	1	OPWSOFFL_RACT	REROUTE OPTION	
513	(201)	CHARACTER	1	OPWSOFFL_AACT	AVAILABLE OPTION	
514	(202)	BITSTRING	2	OPTWO	WTO OPTS	
				OPTWOTE	NO TASK END WTO	
				OPTWOER	ENDED-IN-ERROR STATUS	
				OPTWOLE	LATE OPERATION	
				OPTWODU	TOO LONG DURATION	
				OPTWOQX	QUEUE LIMIT EXCEEDED	
				OPTWORC	RESOURCE CONTENTION	
516	(204)	BITSTRING	2	OPTAL	NETVIEW GENERIC ALERT	
				OPTALTE	NO TASK END ALERT	
				OPTALER	ENDED-IN-ERROR STATUS	
				OPTALLE	LATE OPERATION	
				OPTALDU	TOO LONG DURATION	
				OPTALQX	QUEUE LIMIT EXCEEDED	
518	(206)	BITSTRING	2	OPTML	MLOG WRITE OPTS	
				OPTMLTE	NO TASK END MLOG WRITE	
				OPTMLER	ENDED-IN-ERROR STATUS	
				OPTMLLE	LATE OPERATION	
				OPTMLDU	TOO LONG DURATION	
				OPTMLQX	QUEUE LIMIT EXCEEDED	
				OPTMLRC	RESOURCE CONTENTION	
	520	(208)	BITSTRING	1	OPTFLAGS5	CAT MGT FLAGS DELETED
			1... ..		OPTOPSUMWS	1: OPSUM DATA FROM WS
			.111 1111		*	FREE
	521	(209)	CHARACTER	1	OPTBESTM	BEST MATCH
						A=ALL F=RF, O=RO
	522	(20A)	UNSIGNED	2	OPTFLAG3	
			1... ..		*	RESERVED

## OPT - Subsystem options

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
		.1. ....		OPTFTWJSUB	1: TWS FOR z/OS SUBMITS JOBS
		..1. ....		OPTMHLDSF	MANUAL HOLD AT SUBMIT FAIL
		...1 ....		OPTMONTBSM	1: TBSM EXTERNAL MONITOR
		.... 1...		OPTMONTEP	1: TEP EXTERNAL MONITOR
		.... .111		*	RESERVED
523	(20B)	CHARACTER	1	OPTTWSJBNM	TWSJOBNAME VALUE IN JTOPTS O: OCCNAME E: EXTNAME X: EXTNOCC J: JOBNAME
524	(20C)	SIGNED	4	OPTGMTOF	GMT OFFSET
528	(210)	CHARACTER	8	OPTRODM_PARM	RODM PARM MEMBER NAME
536	(218)	BITSTRING	1	*	RESERVED
537	(219)	CHARACTER	1	OPTOPINS	OPINFOSCOPE I=IN-PRO OPS A=ALL OPS
538	(21A)	SIGNED	2	OPTRSPOL	RESOURCE LOOKAHEAD
540	(21C)	CHARACTER	8	OPTCODEP	CODEPAGE
548	(224)	SIGNED	4	OPTMAXOCCN	MAXIMUM OCC NUMBER
552	(228)	SIGNED	4	OPTSTATIM	STATMSG TIME
556	(22C)	SIGNED	2	OPTEVELIM	EVELIM NUMBER
558	(22E)	CHARACTER	2	OPTSVFAILC (2)	ARRAY FOR SAVARFAIL
560	(230)	CHARACTER	1	OPTVFAILC (3)	ARRAY OF VARFAIL VALUES (&, %, ?)
563	(233)	1... ....		OPTXITXRES	EXTENDED STAT X OPTION
		.1.. ....		OPTSUPPENF	SUPPESSENF
		..1. ....		OPTSAMSGMLOG	AUTOMATION MSG LOGGING
		...1 ....		OPTSAMSGSLOG	AUTOMATION MSG LOGGING
		.... 1...		OPTSVFAIL	1: IGNORE VARIABLE SUBSTITUTION FAILURE
		.... .111		*	FREE
564	(234)	ADDRESS	4	OPTFLPARM	POINTER TO FL PARMS
568	(238)	CHARACTER	10	OPTWLM	
				OPTWLMRQ	WLM REQUEST
				OPTWLMMODE	WLM MODE
				OPTWLMPOLICY	WLM POLICY IN MODE1
569	(239)	CHARACTER	8	OPTWLMHPCLASS	HI.PERF. WLM1 CLASS
577	(241)	UNSIGNED	1	OPTWLMTHRESHOLD	WLM SMART THRESHOLD
578	(242)	CHARACTER	2	*	FREE
580	(244)	ADDRESS	4	OPTRCL	POINTER TO RCLOPTS
584	(248)	CHARACTER	8	OPTTPLGSRV	TOPOLOGY PARAMETER MEMBER
592	(250)	ADDRESS	4	OPTJPLEXP	ADDRESS OF JESPLEX SYSTEM NAME LIST (MAPPED BY DCLJPLEX)
596	(254)	SIGNED	2	OPTSYSPLID	SYSPLEX ID
598	(256)	SIGNED	2	OPTDLSMO	DEADLINE SMOOTHING FACTOR
600	(258)	SIGNED	2	OPTDLFDK	DEADLINE LIMIT FEEDBACK
602	(25A)	CHARACTER	2	*	FREE
604	(25C)	ADDRESS	4	OPTMONO	POINTER TO MONOPTS
608	(260)	BITSTRING	2	OPTMONP	MONPOL OPTIONS
		1... ....		OPTMPER	ERROR JOB FLAG

## OPT - Subsystem options

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
		.1.. ....		OPTMPCRT	CRITICAL JOB FLAG
		..1. ....		OPTMPCRP	CRITICAL PATH JOB FLAG
		...1 ....		OPTMPLAT	LATE JOB FLAG
		.... 1...		OPTMPDUR	LONG DURATION JOB FLAG
		.... .1..		OPTMPMAN	MANUAL FLAG
610	(262)	BITSTRING	2	OPTMONAL	TEP MONALERT
		1... ....		OPTMOER	ENDED-IN-ERROR STATUS
		.1.. ....		OPTMOEOP	TASKS ENDED IN ERROR
		..1. ....		OPTMOLA	LATE OPERATION
		...1 ....		OPTMODU	TOO LONG DURATION
		.... 1...		OPTMOQX	QUEUE LIMIT EXCEDEED
		.... .1..		OPTMOWLM	WLM FLAG
		.... ..1.		OPTMOSPE	SPECIAL RESOURCE TIME OUT
		.... ...1		OPTMOMSG	MONITORED MESSAGE
611	(263)	1... ....		OPTMONOP	MONITORED JOBS
612	(264)	CHARACTER	8	OPTMONCODE	CODEPAGE FOR MONITOR TASK
620	(26C)	CHARACTER	68	*	ADDR TO TCP/IP AREA
624	(270)	BITSTRING	1	NOERRFLG	RESERVED
		1... ....		OPTNOMEMB	RESERVED
		.111 1111		*	RESERVED
625		BITSTRING	1	OPTFLAG1	AUDITCP STATEMENT:
		1... ....		OPTCDEPSTP	
		.1.. ....		OPTUNEXPRC	
		..11 1111		*	
626		SIGNED	2	OPTALEAC	
628		ADDRESS	4	OPTPARWSTABLETPTR	PARALLEL WORKSTATIONS
632		ADDRESS	4	OPHTTTPPTR	ADDR TO HTTPPTS AREA
636		SIGNED	4	OPTMHISTR	MAX DB2 HISTORY ROWS
640		SIGNED	2	OPTALEMINDUR	
642		CHARACTER	46	*	RESERVED
688	(288)	CHARACTER		OPTEND	END OF OPT

## Cross reference

Name	Hex Offset	Hex Value	Level
OPT	0		1
OPTABNUM	1C		2
OPTABPTR	54		2
OPTACCT	9	20	3
OPTADLIM	1E4		2
OPTADSMF	1E2		2
OPTAL	204		2
OPTALDU	204	10	3
OPTALEAC	272		2
OPTALEMINDUR	280		2
OPTALER	204	40	3
OPTALLE	204	20	3
OPTALQX	204	08	3
OPTALTE	204	80	3
OPTAPDST	A	08	3
OPTAPPC	8	20	3

## OPT - Subsystem options

Name	Hex Offset	Hex Value	Level
OPTARM	B	08	3
OPTARNM	188		2
OPTARNUM	20		2
OPTARPTR	58		2
OPTAUDIT	1D0		2
OPTAWSTB	40		2
OPTBACK	14		2
OPTBESTM	209		2
OPTCALNM	1C0		2
OPTCDEP	E	40	4
OPTCDEPSTP	271	80	3
OPTCNDSUB	E	10	3
OPTCODEP	21C		2
OPTCPMS	8	40	3
OPTCPNEW	8	80	3
OPTDALLY	8	02	3
OPTDATA	1D0	20	3
OPTDB2	9	08	3
OPTDESC	0		2
OPTDLFDK	258		2
OPTDLSMO	256		2
OPTDTPTR	5C		2
OPTDUAL	8	10	3
OPTDYNEV	A	20	3
OPTDYNONCO	D		2
OPTDYNSU	A	10	3
OPTEND	2B0		2
OPTEVELIM	22C		2
OPTEVMS	7	80	3
OPTEWTR	6	10	3
OPTTEXTMON	B	02	3
OPTFLAGS	6		2
OPTFLAGS5	208		2
OPTFLAG1	271		2
OPTFLAG2	A		2
OPTFLAG3	20A		2
OPTFLPARM	234		2
OPTFLTASK	B	20	3
OPTFTWJSUB	20A	40	3
OPTGMTOF	20C		2
OPTGROUP	198		2
OPTGSMS	7	01	3
OPTGSTASK	1E8		2
OPTGTAB	1B0		2
OPTHISTP	50		2
OPTHOST	6	80	3
OPTHOSTF	9	40	3
OPTHRCNR	24		2
OPTIALLY	8	04	3
OPTJCC	6	08	3
OPTJCCNM	78		2

## OPT - Subsystem options

Name	Hex Offset	Hex Value	Level
OPTJDESTP	38		2
OPTJOPT	7	08	3
OPTJPLEXP	250		2
OPTJSUB	6	02	3
OPTJTLOG	1F4		2
OPTKSRS	7	20	3
OPTKSRX	7	40	3
OPTMAXJS	28		2
OPTMAXOCCN	224		2
OPTMEM	1A0		2
OPTMHISTR	27C		2
OPTMHLDSF	20A	20	3
OPTMIRRD	70		2
OPTML	206		2
OPTMLDU	206	10	3
OPTMLER	206	40	3
OPTMLLE	206	20	3
OPTMLQX	206	08	3
OPTMLRC	206	04	3
OPTMLTE	206	80	3
OPTMODU	262	10	3
OPTMOEOP	262	40	3
OPTMOER	262	80	3
OPTMOLA	262	20	3
OPTMOMSG	262	01	3
OPTMONAL	262		2
OPTMONCODE	264		2
OPTMONO	25C		2
OPTMONOP	263	80	3
OPTMONP	260		2
OPTMONTBSM	20A	10	3
OPTMONTEP	20A	08	3
OPTMOQX	262	08	3
OPTMOSPE	262	02	3
OPTMOWLM	262	04	3
OPTMPCRP	260	20	3
OPTMPCRT	260	40	3
OPTMOPDUR	260	08	3
OPTMPER	260	80	3
OPTMPLAT	260	10	3
OPTMPMAN	260	04	3
OPTNCFNM	68		2
OPTNEC	6	20	3
OPTNGENS	B	01	3
OPTNPRT	6	01	3
OPTNRDR	18		2
OPTOFF_DLY	34		2
OPTONCOMPL	C		2
OPTONODE	1ED		2
OPTOPINS	219		2
OPTOPITM	1E6		2

## OPT - Subsystem options

Name	Hex Offset	Hex Value	Level
OPTOPSUMWS	208	80	3
OPTOSUB	7	10	3
OPTOVERC	1F6		2
OPTPARWSTABLEPTR	274		2
OPTPGMR	9	10	3
OPTPLAN	1EA		2
OPTPLEX	A	04	3
OPTPROC	B	80	3
OPTPULSE	1F8		2
OPTQLEN	1E0		2
OPTRCL	244		2
OPTRCVY	6	04	3
OPTRDRNM	88		2
OPTREAD	1D0	40	3
OPTRER	9	04	3
OPTRES	8	08	3
OPTRODM	A	40	3
OPTRODM_FARM	210		2
OPTRSCONT	3C		2
OPTRSPOL	21A		2
OPTSAMSGMLOG	233	20	2
OPTSAMSGSLOG	233	10	2
OPTSBNO	7	04	3
OPTSBOK	7	02	3
OPTSECHK	242		2
OPTSERVER	A	02	3
OPTSFAIL	1F3		2
OPTSHPOL	1F0		2
OPTSIDP	60		2
OPTSIM	8	01	3
OPTSPIN	B	10	3
OPTSRVSPTR	64		2
OPTSSCMN	190		2
OPTSSCMP	A	80	3
OPTSSXB	9	02	3
OPTSSXBM	9	01	3
OPTSTATIM	228		2
OPTSTBY	6	40	3
OPTSTME	2C		2
OPTSTMS	30		2
OPTSUPOL	1EE		2
OPTSUPPENF	233	40	2
OPTSUPPL	1F2		2
OPTSVFAIL	233	08	2
OPTSVFAILC	22E		2
OPTSYSF	9	80	3
OPTSYSPLID	254		2
OPTTCPID	48		2
OPTTCPPORT	44		2
OPTTIMEOUT	1FA		2
OPTTPLGSRV	248		2



## OPT - Subsystem options

Name	Hex Offset	Hex Value	Level
OPTTPLGY	B	04	3
OPTTRACK	1D0	80	3
OPTTWSJBNM	20B		2
OPTUNEXPRC	271	40	3
OPTUX001FA	218		2
OPTVER	4		2
OPTVFAIL	B	40	3
OPTVFAILC	230		2
OPTVSUB	1EC		2
OPTWLM	238		2
OPTWLMHPCLASS	239		3
OPTWLMMODE	238	70	3
OPTWLMPOLICY	238	0F	3
OPTWLMRQ	238	80	3
OPTWLMTHRESHOLD	241		3
OPTWO	202		2
OPTWODU	202	10	3
OPTWOER	202	40	3
OPTWOLE	202	20	3
OPTWOQX	202	08	3
OPTWORC	202	04	3
OPTWOTE	202	80	3
OPTWSFAIL	1FC		2
OPTWSMS	A	01	3
OPTWSOFFL	1FF		2
OPTWTRNM	80		2
OPTXITFL	12		2
OPTXITNM	108		2
OPTXITXRES	233	80	2
OPTX01SZ	10		2
OPWSFAIL_AACT	1FE		3
OPWSFAIL_RACT	1FD		3
OPWSFAIL_SACT	1FC		3
OPWSOFFL_AACT	201		3
OPWSOFFL_RACT	200		3
OPWSOFFL_SACT	1FF		3

## PER - Period layout

Name : DCLPER

Function:

This segment declares a period definition, physically located in the workstation description database (EQQWSDS)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	PERREC	PERIOD LAYOUT
0	(0)	CHARACTER	94	PERFIX	FIXED PART OF RECORD
0	(0)	CHARACTER	2	*	RESERVED BY I/O-ROUTINES
2	(2)	CHARACTER	8	PERKEY	

## PER - Period layout

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
2	(2)	CHARACTER	8	PERIOD	PERIOD ID <<<=====KEY
10	(A)	UNSIGNED	1	PERVERS	VERSION OF RECORD NUM=NEW
11	(B)	BITSTRING	1	*	RESERVED
12	(C)	SIGNED	2	PERINTVL	INTERVAL OF CYCLIC ORIGINS
14	(E)	CHARACTER	1	PERTYPE	CYCLIC/NONCYCLIC TYPE
15	(F)	CHARACTER	30	PERDESC	DESCRIPTION OF PERIOD
45	(2D)	CHARACTER	8	PERUSER	ID OF USER LAST CHANGE
53	(35)	CHARACTER	6	PERDATE	DATE FOR LAST CHANGE
59	(3B)	CHARACTER	4	PERTIME	TIME FOR LAST CHANGE, HHMM
63	(3F)	CHARACTER	5	*	FREE
68	(44)	CHARACTER	8	PERLUTS	LAST UPDATE TIMESTAMP
76	(4C)	CHARACTER	16	PERJVT	JCL VARIABLE TABLE ID
92	(5C)	SIGNED	2	PERORGS	ORIGIN DATES IN PERIOD
94	(5E)	CHARACTER	12	PERVAR (*)	VARIABLE PART OF REC
94	(5E)	CHARACTER	6	PERORIG	ORIGIN(=START)DATE INT
100	(64)	CHARACTER	6	PERIVLEND	END DATE OF INTERVAL

## Cross reference

Name	Hex Offset	Hex Value	Level
PERDATE		35	3
PERDESC		F	3
PERFIX		0	2
PERINTVL		C	3
PERIOD		2	4
PERIVLEND		64	3
PERJVT		4C	3
PERKEY		2	3
PERLUTS		44	3
PERORGS		5C	3
PERORIG		5E	3
PERREC		0	1
PERTIME		3B	3
PERTYPE		E	3
PERUSER		2D	3
PERVAR		5E	2
PERVERS		A	3

## RCLOP - Restart and clean up options record

Name : DCLRCLOP

Function:

This segment declares the layout of the restart and clean up options record.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	116	RCLOP	RCLOPTS
0	(0)	CHARACTER	4	RCO_EYE	EYE CATCHER

## RCLOP - Restart and clean up options record

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
4	(4)	SIGNED	4	RCO_SP	SUBPOOL USE BY STORAGE MACRO	
8	(8)	CHARACTER	8	RCO_PROTDSMBR	DSNPROT: MEMBER NAME CONTAINING THE PROTECTED DSN LIST	
16	(10)	ADDRESS	4	RCO_PROTDSNP	POINTER TO PROTECTED DSN LIST	
20	(14)	CHARACTER	8	RCO_PROTDDMBR	DDPROT: MEMBER NAME CONTAINING THE PROTECTED DD LIST	
28	(1C)	ADDRESS	4	RCO_PROTDDNP	POINTER TO PROTECTED DD LIST	
32	(20)	ADDRESS	4	RCO_NORESTP	DDNOREST: POINTER TO THE LIST OF DDNAMES THAT MAKE THE STEP NON-RESTARTABLE	
36	(24)	ADDRESS	4	RCO_NEVEXP	DDNEVER: POINTER TO THE LIST OF DDNAMES THAT MAKE THE STEP NEVER EXECUTABLE	
40	(28)	ADDRESS	4	RCO_ALWAYS	DDALWAYS: POINTER TO THE LIST OF DDNAMES THAT MAKE THE STEP ALWAYS RE-EXECUTABLE	
44	(2C)	CHARACTER	8	RCO_DSDEST	DSTDEST: DESTINATION	
52	(34)	CHARACTER	5	RCO_CLJOBNA	CLNJOBNM: PREFIX TO BE USED TO GENERATE THE NAME OF THE CLEAN UP JOB	
57	(39)	CHARACTER	1	RCO_USERSYS	USERSYS: HANDLE USER SYSOUT FLAG	
58	(3A)	CHARACTER	1	RCO_RMMACTIVE	RMM: Y N RMM ACTIVE	
59	(3B)	CHARACTER	1	RCO_STEPRESCHK	STEPRESCHK YES (default) NO	
60	(3C)	ADDRESS	4	RCO_SAVPROTDD	POINTER TO DD PROTLIST (MAJOR SHOULD FREE)	
64	(40)	ADDRESS	4	RCO_SAVPROTDS	POINTER TO DS PROTLIST (MAJOR SHOULD FREE)	
68	(44)	ADDRESS	4	RCO_JCCCLTAB	POINTER TO JES CLASS TAB	
72	(48)	SIGNED	4	*	RESERVED	
76	(4C)	CHARACTER	40	RCO_JOBINFO	WHAT FOLLOWS JOB IN JOB CARD	

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	100	RCO_EXTRA	EXTRA AREA	
0	(0)	CHARACTER	44	RCO_STEPLIB	EQQCLEAN STEPLIB	
44	(2C)	CHARACTER	8	RCO_SKIPMEM	SKIPINCLULDE MEMBER NAME	
52	(34)	ADDRESS	4	RCO_SKIPMEMP	POINTER TO SKIP INCLUDE LIST	
56	(38)	CHARACTER	1	RCO_IMMLOGIC	B = BEST, A = AR STEP	
57	(39)	CHARACTER	1	RCO_GDGSIMAUTO	Y/N	
58	(3A)	CHARACTER	8	RCO_DYMMYLAST	DUMMY LAST STEP	
66	(42)	CHARACTER	1	RCO_GDGPROT	GDG PROTECTION LOCK	
67	(43)	CHARACTER	1	RCO_JLOG	E = ON ERROR, D = ON DEMAND (DEFAULT)	
68	(44)	CHARACTER	1	RCO_JOPI	E = ON ERROR, D = ON DEMAND (DEFAULT)	
69	(45)	CHARACTER	31	*	FREE	

## RCLOP - Restart and clean up options record

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	*	RCO_SKIPEL	SKIPINCL NAME LIST	
0	(0)	CHARACTER	10	RCO_SKIPFIX	FIXED PART	
0	(0)	CHARACTER	4	RCO_SKIPEYE	EYE CATCHER = RSKI	
4	(4)	SIGNED	4	RCO_SKIPTSZ	TOTAL SIZE OF AREA	
8	(8)	SIGNED	2	RCO_SKIPCTR	COUNT OF ARRAY ELEMENTS	
10	(A)	CHARACTER	8	RCO_SKIPVAR(*)	VARIABLE PART	
10	(A)	CHARACTER	8	RCO_SKIPNAME	PROTECTED DSNAME	

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	*	RCO_PROTDSN	PROTECTED DSN LIST	
0	(0)	CHARACTER	10	RCO_PRDSFIX	FIXED PART	
0	(0)	CHARACTER	4	RCO_PRDSEYE	EYE CATCHER	
4	(4)	SIGNED	4	RCO_PRDSTSZ	TOTAL SIZE OF AREA	
8	(8)	SIGNED	2	RCO_PRDSCTR	COUNT OF ARRAY ELEMENTS	
10	(A)	CHARACTER	44	RCO_PRDSVAR(*)	VARIABLE PART	
10	(A)	CHARACTER	44	RCO_PRDSNAME	PROTECTED DSNAME	

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	*	RCO_PROTDDN	PROTECTED DDN LIST	
0	(0)	CHARACTER	10	RCO_PRDDFIX	FIXED PART	
0	(0)	CHARACTER	4	RCO_PRDDEYE	EYE CATCHER	
4	(4)	SIGNED	4	RCO_PRDDTSZ	TOTAL SIZE OF AREA	
8	(8)	SIGNED	2	RCO_PRDDCTR	COUNT OF ARRAY ELEMENTS	
10	(A)	CHARACTER	8	RCO_PRDDVAR(*)	VARIABLE PART	
10	(A)	CHARACTER	8	RCO_PRDDNAME	PROTECTED DDNAME	

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	*	RCO_NOREST	POINTER TO THE LIST OF DDNAMES THAT MAKE THE STEP NON-RESTARTABLE	
0	(0)	CHARACTER	10	RCO_NORSFIX	FIXED PART	
0	(0)	CHARACTER	4	RCO_NORSEYE	EYE CATCHER	
4	(4)	SIGNED	4	RCO_NORSTSZ	TOTAL SIZE OF AREA	
8	(8)	SIGNED	2	RCO_NORSCTR	COUNT OF ARRAY ELEMENTS	
10	(A)	CHARACTER	8	RCO_NORSVAR(*)	VARIABLE PART	
10	(A)	CHARACTER	8	RCO_NORSDDN	DDNAME	

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	*	RCO_NEVEX	POINTER TO THE LIST OF DDNAMES THAT MAKE THE STEP NEVER EXECUTABLE	
0	(0)	CHARACTER	10	RCO_NEVEXFIX	FIXED PART	
0	(0)	CHARACTER	4	RCO_NEVEXEYE	EYE CATCHER	
4	(4)	SIGNED	4	RCO_NEVEXTSZ	TOTAL SIZE OF AREA	
8	(8)	SIGNED	2	RCO_NEVEXCTR	COUNT OF ARRAY ELEMENTS	
10	(A)	CHARACTER	8	RCO_NEVEXVAR(*)	VARIABLE PART	

## RCLOP - Restart and clean up options record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
10	(A)	CHARACTER	8	RCO_NEVEXDDN	DDNAME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	RCO_ALWAYS	POINTER TO THE LIST OF DDNAMES THAT MAKE THE STEP ALWAYS RE-EXECUTABLE
0	(0)	CHARACTER	10	RCO_ALWYFIX	FIXED PART
0	(0)	CHARACTER	4	RCO_ALWYEYE	EYE CATCHER
4	(4)	SIGNED	4	RCO_ALWYTSZ	TOTAL SIZE OF AREA
8	(8)	SIGNED	2	RCO_ALWYCTR	COUNT OF ARRAY ELEMENTS
10	(A)	CHARACTER	8	RCO_ALWYVAR(*)	VARIABLE PART
10	(A)	CHARACTER	8	RCO_ALWYDDN	DDNAME

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	RCO_JESDST	POINTER TO THE LIST OF DESTINATIONS AND JES CL
0	(0)	CHARACTER	16	RCO_CLTABLE	COMMON PART
0	(0)	SIGNED	4	RCO_LISTCNT	COUNTER OF TABLE ENTRIES
4	(4)	SIGNED	4	RCO_TABLEN	LENGTH OF THE TABLE
8	(8)	CHARACTER	8	*	RESERVED
16	(10)	CHARACTER	16	RCO_CLASTAB(*)	CLASS VAR TABLE
16	(10)	CHARACTER	8	RCO_TRKDEST	TRACKER DESTINATION
24	(18)	CHARACTER	1	RCO_JESCLAS	JES CLASS FOR OUTPUT
25	(19)	CHARACTER	7	*	RESERVED

## Cross reference

Name	Hex Offset	Hex Value	Level
RCLOP	0		1
RCO_ALWAYS	0		1
RCO_ALWAYSSP	28		2
RCO_ALWYCTR	8		3
RCO_ALWYDDN	A		3
RCO_ALWYEYE	0		3
RCO_ALWYFIX	0		2
RCO_ALWYTSZ	4		3
RCO_ALWYVAR	A		2
RCO_CLASTAB	10		2
RCO_CLJOBNA	34		2
RCO_CLTABLE	0		2
RCO_DSDEST	2C		2
RCO_DUMMYLAST	3A		2
RCO_EXTRA	0		2
RCO_EYE	0		2
RCO_GDGPROT	42		2
RCO_GDGSIMAUTO	39		2
RCO_IMMLOGIC	38		2
RCO_JCCCLTAB	44		2

## RCLOP - Restart and clean up options record

Name	Hex Offset	Hex Value	Level
RCO_JESCLASS	18		3
RCO_JESDST	0		1
RCO_JLOG	43		2
RCO_JOBINFO	4C		2
RCO_JOPI	44		2
RCO_LISTCNT	0		3
RCO_NEVEX	0		1
RCO_NEVEXCTR	8		3
RCO_NEVEXDDN	A		3
RCO_NEVEXEYE	0		3
RCO_NEVEXFIX	0		2
RCO_NEVEXP	24		2
RCO_NEVEXTSZ	4		3
RCO_NEVEXVAR	A		2
RCO_NOREST	0		1
RCO_NORESTP	20		2
RCO_NORSCTR	8		3
RCO_NORSDDN	A		3
RCO_NORSEYE	0		3
RCO_NORSFIX	0		2
RCO_NORSTSZ	4		3
RCO_NORSVAR	A		2
RCO_PRDDCTR	8		3
RCO_PRDDEYE	0		3
RCO_PRDDFIX	0		2
RCO_PRDDNAME	A		3
RCO_PRDDTSZ	4		3
RCO_PRDDVAR	A		2
RCO_PRDSCTR	8		3
RCO_PRDSEYE	0		3
RCO_PRDSFIX	0		2
RCO_PRDSNAME	A		3
RCO_PRDSTSZ	4		3
RCO_PRDSVAR	A		2
RCO_PROTDDMBR	14		2
RCO_PROTDDN	0		1
RCO_PROTDDNP	1C		2
RCO_PROTDSMBR	8		2
RCO_PROTDSN	0		1
RCO_PROTDSNP	10		2
RCO_RMMACTIVE	3A		2
RCO_SAVPROTDD	3C		2
RCO_SAVPROTDS	40		2
RCO_SP	4		2
RCO_STEPRESCHK	3B		2
RCO_TABLEN	4		3
RCO_TRKDEST	10		3
RCO_USERSYS	39		2

---

## REL - Job release record

Name : DCLREL

Function:

This segment declares the layout of a release record in a submit release data set

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	80	REL	RELEASE RECORD
0	(0)	CHARACTER	8	RELJOBNM	JOB NAME
8	(8)	CHARACTER	8	RELJOBID	JOB ID
16	(10)	CHARACTER	16	RELADID	APPLICATION NAME
32	(20)	CHARACTER	10	RELOPIA	OPERATION INPUT ARRIVAL
42	(2A)	SIGNED	2	RELOPNUM	OPERATION NUMBER
44	(2C)	CHARACTER	4	RELWSID	WORK STATION NAME
48	(30)	SIGNED	4	RELRETRY	NUMBER OF RELEASE RETRIES
52	(34)	CHARACTER	28	RELSPARE	SPARE

## Cross reference

Name	Hex Offset	Hex Value	Level
REL	0		1
RELADID	10		2
RELJOBID	8		2
RELJOBNM	0		2
RELOPIA	20		2
RELOPNUM	2A		2
RELRETRY	30		2
RELSPARE	34		2
RELWSID	2C		2

---

## RSR - Special resource record

Name : DCLRSR

Function:

Resource Class Data Description Declare. This segment describes the main key of a resource data instance, as well as defining the actual data objects contained for this key. This mapping applies to the RD data set records, the CX data sets, and for resource data in storage.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	44	RSU	
0	(0)	ADDRESS	4	RSUNEXT	ADDRESS TO NEXT ENTRY   0
4	(4)	CHARACTER	4	RSUEYE	ID
8	(8)	CHARACTER	2	RSUVER	VERSION NUMBER
10	(A)	CHARACTER	2	*	RESERVED
12	(C)	CHARACTER	4	RSUOPER	CP OPERATION ID
12	(C)	UNSIGNED	3	RSUOCC	OCCURRENCE ID
15	(F)	UNSIGNED	1	RSUOP	OPERATION ID
16	(10)	CHARACTER	1	RSUALCTYPE	ALLOCATE TYPE (X/S)

## RSR - Special resource record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
17	(11)	CHARACTER	11	*	RESERVED
28	(1C)	CHARACTER	4	RSUWS	WORK STATION
32	(20)	SIGNED	4	RSUALCNUM	AMOUNT ALLOCATED
36	(24)	CHARACTER	8	RSUJOBN	JOBNAME
44	(2C)	CHARACTER		RSUEND	END

OPERATIONS WAITING FOR RESOURCE ALLOCATION ADDRESSED VIA QRSPLNWAIT (SEE DCLQRS)

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	44	RSW	
0	(0)	ADDRESS	4	RSWNEXT	ADDRESS TO NEXT ENTRY   0
4	(4)	CHARACTER	4	RSWEYE	ID
8	(8)	CHARACTER	2	RSWVER	VERSION NUMBER
10	(A)	BITSTRING	1	RSWFLAGS	FLAG BYTE
				RSWCONTTIE	CONTENTION MESSAGE TIE BUILD
				RSWCHANGED	RESOURCE WAS UPDATED
				*	RESERVED
11	(B)	CHARACTER	1	*	RESERVED
12	(C)	CHARACTER	4	RSWOPER	CP OPERATION KEY
12	(C)	UNSIGNED	3	RSWOCC	OCCURRENCE ID
15	(F)	UNSIGNED	1	RSWOP	OPERATION ID
16	(10)	CHARACTER	1	RSWALCTYPE	ALLOCATE TYPE (X/S)
17	(11)	CHARACTER	11	*	RESERVED
28	(1C)	CHARACTER	4	RSWWS	WORK STATION
32	(20)	SIGNED	4	RSWALCNUM	AMOUNT TO ALLOCATE
36	(24)	CHARACTER	8	RSWALCTIME	TIME PUT ON WAIT Q (TOD)
44	(2C)	CHARACTER		RSWEND	END

DIALOG RESOURCE LIST EXTENSION THE EXTENSION IS APPENDED TO THE RS MAIN BODY DURING A GS LIST REQUEST.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	72	RSL	DIALOG LIST EXTENTION
0	(0)	SIGNED	4	RSLXUSE	CURRENT USED EXCLUSIVE
4	(4)	SIGNED	4	RSLSUSE	CURRENT USED SHARED
8	(8)	SIGNED	4	RSLWAITR	RESERVED
12	(C)	SIGNED	4	*	WAITING REASON (SEE DCLQDRSN)
16	(10)	CHARACTER	1	RSLWQF	ELEMENTS ON WAIT QUEUE (Y/N)
17	(11)	CHARACTER	1	RSLXALL	ANY CURRENT ALL X
18	(12)	CHARACTER	1	RLSALL	S
19	(13)	CHARACTER	5	*	RESERVED
24	(18)	CHARACTER	48	RSLCURIVL	CURRENT INTERVAL
72	(48)	CHARACTER		RSEND	END

DIALOG IN USE LIST AND WAITING QUEUE MAPPING. USED FOR DIALOG REQUESTS WITH RESOURCE CODE RESESWQ & RESRSUL.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	72	RSD	
0	(0)	CHARACTER	28	RSDKEY	CP KEY
0	(0)	CHARACTER	16	RSDOCC	OCC ID



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
16	(10)	CHARACTER	6	RSDOCCIAD	OCC INPUT ARRIVAL DATE
22	(16)	CHARACTER	4	RSDOCCIAT	OCC INPUT ARRIVAL TIME
26	(1A)	SIGNED	2	RSDOPNO	OPERATION NUMBER
28	(1C)	CHARACTER	4	RSDWS	WORK STATION
32	(20)	CHARACTER	8	RSDJOBNAME	JOBNAME
40	(28)	CHARACTER	6	RSDOPSTD	OPERATION START/L.OUT DATE
46	(2E)	CHARACTER	4	RSDOPSTT	OPERATION START/L.OUT TIME
50	(32)	SIGNED	4	RSDOCCNO	OCCURRENCE NUMBER
54	(36)	SIGNED	4	RSDALCNUM	AMOUNT ALLOCATED
58	(3A)	SIGNED	2	RSDPRIO	PRIORITY
60	(3C)	SIGNED	2	RSDDUR	DURATION
62	(3E)	CHARACTER	1	RSDALCTYPE	ALLOCATION TYPE
63	(3F)	CHARACTER	1	RSDSTAT	STATUS
64	(40)	SIGNED	4	RSDWRSN	REASON FOR WAIT
68	(44)	CHARACTER	1	RSDIAFLAG	FLAGS
				RSDINUSEL	IN-USE LIST
69	(45)	CHARACTER	3	*	RESERVED
72	(48)	CHARACTER		RSDEND	END

RESOURCE INSTANCE DESCRIPTION. KEY FIELDS ARE DEFINED HERE. WHEN LOCATED IN THE RS-DATASPACE THE RECORD IS ADDRESSABLE VIA QRSPLNIX (SEE DCLQRS).

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	216	RS	RESOURCE INSTANCE STRUCTURE
0	(0)	CHARACTER	64	RSKEY	KEY STRUCTURE
0	(0)	CHARACTER	2	RSID	USED BY FOR IO METHODS
2	(2)	CHARACTER	44	RSNAME	PLAN INSTANCE KEY
46	(2E)	CHARACTER	16	*	RESERVED FOR ADDITIONAL KEY FIELDS

OBJECT HEADER. CONTAINS THE INDEX ID OF THE RESOURCE AS WELL AS COMMON RESOURCE DATA.

NOTE: THE OBJECT HEADER IS NOT POSSIBLE TO UPDATE IN DIALOG CODE.

64	(40)	CHARACTER	12	RSOBJDESC	OBJECT HEADER STRUCTURE
64	(40)	SIGNED	4	*	RESERVED
68	(44)	SIGNED	4	RSOBJIDX	RESOURCE INDEX NUMBER
72	(48)	BITSTRING	1	RSOFLAGS	FLAG BYTE
				RSOUPDATE	RECORD UPDATED (IN DSPC ONLY)
				RSOCONERR	ON ERROR MODIFIED IN CX
				RSOCUSEDFOR	USED FOR CHANGED IN CX
				RSOCDEFWSC	DEFAULT WSC CHANGED IN CX
				RSODYNADD	DYNADDED RESOURCE
				*	RESERVED
73	(49)	CHARACTER	1	RSORODMA	RODM STATUS, AVAILABILITY
74	(4A)	CHARACTER	1	RSORODMQ	QUANTITY
75	(4B)	CHARACTER	1	RSORODMD	DEVIATION
REST OF MAIN RS BODY.					
76	(4C)	CHARACTER	4	RSEYE	RECORD ID
80	(50)	SIGNED	4	RSVER	RECORD VERSION
84	(54)	CHARACTER	8	RSLUSER	LAST UPDATING USER in RD
92	(5C)	CHARACTER	8	RSGROUP	GROUP ID
100	(64)	CHARACTER	6	RSLUDATE	DATE OF LAST UPDATE in RD
106	(6A)	CHARACTER	4	RSLUTIME	TIME OF LAST UPDATE IN RD

## RSR - Special resource record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
110	(6E)	CHARACTER	2	RSONERROR	ON ERROR OPTION: F=FREE FX=FREE IF EXCLUSIVE FS=FREE IF SHARED K=KEEP <BLANK>=USE DEFAULTS
112	(70)	SIGNED	4	RSDEVIATION	DEVIATION OF ABOVE (MAX)
116	(74)	CHARACTER	46	RSDESC	RESOURCE DESCRIPTION
162	(A2)	CHARACTER	6	RSLUATECP	DATE OF LAST UPD in CP
168	(A8)	CHARACTER	4	RSLUTIMECP	TIME OF LAST UPD IN CP
				2 CHAR(2) , RESERVED	
172	(AC)	SIGNED	4	RSGQUANT	GLOBAL (OVERRIDE) QUANTITY
176	(B0)	CHARACTER	1	RSGAVAIL	GLOBAL (OVERRIDE) AVAILABILITY
177	(B1)	CHARACTER	1	RSELAVAIL	AVAIL FILTER NEXT HAD TO BE MOVED DUE TO CONFLICT WITH V2 ENH. WITH FLAG XB
178	(B2)	CHARACTER	8	RSRLUTS	LAST UPDATE TIMESTAMP
186	(BA)	CHARACTER	8	RSLUSERCP	LAST UPDATING USER IN CP
194	(C2)	CHARACTER	1	RSHIPER	DLF RESOURCE, Y OR N
195	(C3)	CHARACTER	1	RSUSEDFOR	USED FOR (N P C B)
196	(C4)	CHARACTER	1	RSELWAIT	WAIT FILTER
197	(C5)	CHARACTER	1	RSELALCS	ALLOCATED FILTER
198	(C6)	CHARACTER	1	RSONCOMPLETE	ON COMPLETE OPTION: Y=SET TO YES N=SET TO NO R=RESET <BLANK>=USE DEFAULTS
199	(C7)	CHARACTER	1	RSLASTMODTYPE	LAST UPDATE OF GLOBAL AVAILABILITY DUE TO:  E = EVENT APPLIED M = MAX LIMIT L = LIFESPAN TIE C = ON COMPLETE ACTION <BLANK> = OTHER
200	(C8)	SIGNED	4	RSIVLNUM	NUMBER OF INTERVALS
204	(CC)	SIGNED	4	RSIVLOFF	OFFSET ->
208	(D0)	SIGNED	4	RSIVLCUR	CURRENT INTERVAL
212	(D4)	SIGNED	4	RSIVLDOFF	RESERVED
216	(D8)	SIGNED	4	RSUSAGECOUNTER	USAGE COUNTER: INCREASED BY 1 EACH TIME A JOB ALLOCATES THE SR. RESET TO 0 WHEN MAX USAGE LIMIT IS EXCEEDED.
220	(DC)	SIGNED	4	RSMAXUSAGELIMIT	MAX USAGE LIMIT: 0 = DO NOT USE COUNTERS (THIS IS THE DEFAULT)
224	(E0)	CHARACTER	1	RSMAXUSAGETYPE	MAX USAGE TYPE: Y = SET TO YES N = SET TO NO <BLANK> = RESET TO BLANK
225	(E1)	CHARACTER	1	RSTIELIFEACT	S TIE ACTION
226	(E2)	CHARACTER	10	RSTIELIFEDAT	S TIE DATE AND TIME
236	(EC)	CHARACTER	4	*	FREE
240	(F0)	CHARACTER		RSEND	END OF OBJECT HEADER

INTERVAL DESCRIPTION ARRAY

## RSR - Special resource record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	48	RSIVL (*)	INTERVAL
0	(0)	SIGNED	4	RSIDAY	DATE &
4	(4)	CHARACTER	6	RSIDATE	DATE &
10	(A)	CHARACTER	2	*	RESERVED
12	(C)	CHARACTER	4	RSIFTIME	FROM TIME
16	(10)	CHARACTER	4	RSITTIME	TO TIME
20	(14)	SIGNED	4	RSIQUANT	MAX TO ALLOCATE
24	(18)	SIGNED	4	RSIQUANTD	MAX TO ALLOCATE (PLAN)
28	(1C)	SIGNED	4	RSIWSCNUM	NUMBER OF CONNECTED WS
32	(20)	CHARACTER	1	RSIAVAIL	AVAILABLE (Y/N)
33	(21)	CHARACTER	1	RSIAVAILD	AVAILABLE (Y/N) (PLAN)
34	(22)	CHARACTER	1	*	RESERVED
35	(23)	BITSTRING	1	RSIFLAGS	FLAG BYTE
				RSIMODIFY	CHANGED IN DIALOG
				*	RESERVED
36	(24)	SIGNED	4	RSIWSOFF	WS OFFSET
40	(28)	CHARACTER	8	*	RESERVED
48	(30)	CHARACTER		RSIEND	END

INTERVAL DATA

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	96	RSIVLDATA	
0	(0)	SIGNED	4	RSIMAXUSED	MAXIMUM CONCURRENT ALLOCATED
4	(4)	SIGNED	4	RSINOWUSES	CURRENTLY USED SHARED
8	(8)	SIGNED	4	RSINOWUSEX	CURRENTLY USED EXCLUSIVE
12	(C)	SIGNED	4	RSINOWALLX	CURRENT ALLOC ALL X
16	(10)	SIGNED	4	RSINOWALLS	CURRENT ALLOC ALL SHARED
20	(14)	SIGNED	4	RSIALCTIME	TIME ALLOCATED
24	(18)	SIGNED	4	RSIWAITTIME	TIME WAITING
28	(1C)	SIGNED	4	RSIUAVATIME	TIME UNAVAILABLE
32	(20)	SIGNED	4	RSIALCFAIL	ALLOCATION FAILIURES
36	(24)	SIGNED	4	RSICONFAIL	WS CONNECT FAILURES (DP ONLY)
40	(28)	SIGNED	4	RSIMADEUA	MADE UNAVAILABLE TIMESTAMP
44	(2C)	SIGNED	4	RSIALCST	ALLOCATION STARTED
48	(30)	SIGNED	4	RSIWAITST	WAIT STARTED
52	(34)	SIGNED	4	RSISTTIME	START TIME OF RSID BLOCK
56	(38)	SIGNED	4	RSIENDTIME	END TIME OF THIS IVLD BLOCK
60	(3C)	CHARACTER	10	RSISTTIMEC	START DATE & TIME IN CHAR
60	(3C)	CHARACTER	6	RSISTTIMEC_D	DATE
66	(42)	CHARACTER	4	RSISTTIMEC_T	TIME
70	(46)	CHARACTER	10	*	RESERVED
80	(50)	SIGNED	4	*(4)	RESERVED
96	(60)	CHARACTER		RSIDEND	END

WORKSTATION CONNECT ARRAY (ONE FOR EACH IVL).

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	8	RSCONWS (*)	

## RSR - Special resource record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	4	RSCWSDNAME	WORK STATION NAME
4	(4)	CHARACTER	4	*	RESERVED
8	(8)	CHARACTER		RSCEND	END

## Cross reference

Name	Hex Offset	Hex Value	Level
RS	0		1
RSCEND	8		2
RSCONWS	0		1
RSCWSDNAME	0		2
RSDESC	74		2
RSDEVIATION	70		2
RSEND	F0		2
RSEYE	4C		2
RSGAVAIL	B0		2
RSGQUANT	AC		2
RSGROUP	5C		2
RSHIPER	C2		2
RSIALCFAIL	20		2
RSIALCST	2C		2
RSIALCTIME	14		2
RSIAVAIL	20		2
RSIAVAILD	21		2
RSICONFAIL	24		2
RSID	0		3
RSIDATE	4		2
RSIDAY	0		2
RSIDEND	60		2
RSIEND	30		2
RSIENDTIME	38		2
RSIFLAGS	23		2
RSIFTIME	C		2
RSIMADEUA	28		2
RSIMAXUSED	0		2
RSIMODIFY	23	80	3
RSINOWALLS	10		2
RSINOWALLX	C		2
RSINOWUSES	4		2
RSINOWUSEX	8		2
RSIQUANT	14		2
RSIQUANTD	18		2
RSISTTIME	34		2
RSISTTIMEC	3C		2
RSISTTIMEC_D	3C		3
RSISTTIMEC_T	42		3
RSITTIME	10		2
RSIUAVATIME	1C		2
RSIVL	0		1
RSIVLCUR	D0		2

## RSR - Special resource record

Name	Hex Offset	Hex Value	Level
RSIVLDATA	0		1
RSIVLDOFF	D4		2
RSIVLNUM	C8		2
RSIVLOFF	CC		2
RSIWAITST	30		2
RSIWAITTIME	18		2
RSIWSCNUM	1C		2
RSIWSOFF	24		2
RSKEY	0		2
RSLASTMODETYPE	C7		2
RSLUDATE	64		2
RSLUDATECP	A2		2
RSLUSER	54		2
RSLUSERCP	BA		2
RSLUTIME	6A		2
RSLUTIMECP	A8		2
RSMAXUSAGELIMIT	DC		2
RSMAXUSAGETYPE	E0		2
RSNAME	2		3
RSOBJDESC	40		2
RSOBJIDX	44		3
RSOCDEFWSC	48	10	4
RSOCONERR	48	40	4
RSOCUSEDFOR	48	20	4
RSODYNADD	48	08	4
RSOFLAGS	48		3
RSONCOMPLETE	C6		2
RSONERROR	6E		2
RSORODMA	49		3
RSORODMD	4B		3
RSORODMQ	4A		3
RSOUPDATE	48	80	4
RSRLUTS	B2		2
RSELALCS	C5		2
RSELAVAIL	B1		2
RSELWAIT	C4		2
RSTIELIFEACT	E1		2
RSTIELIFEDAT	E2		2
RSUSAGECOUNTER	D8		2
RSUSEDFOR	C3		2
RSVER	50		2
RSW	0		1
RSWALCNUM	20		2
RSWALCTIME	24		2
RSWALCTYPE	10		2
RSWCHANGED	A	40	3
RSWCONTTIE	A	80	3
RSWEND	2C		2
RSWEYE	4		2
RSWFLAGS	A		2
RSWNEXT	0		2

## RSR - Special resource record

Name	Hex Offset	Hex Value	Level
RSWOCC	C		3
RSWOP	F		3
RSWOPER	C		2
RSWVER	8		2
RSWWS	1C		2

## RSRR - Special resource report record

Name : DCLRSRR

Function:

This segment maps the special resource report records in the EQQCXDS.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	136	RSR	RESOURCE INSTANCE STRUCTURE
0	(0)	CHARACTER	64	RSRKEY	KEY STRUCTURE
0	(0)	CHARACTER	2	RSRID	USED BY FOR IO METHODS
2	(2)	CHARACTER	44	RSRNAME	PLAN INSTANCE KEY
46	(2E)	CHARACTER	10	RSRFROM	REPORT INTERVAL START
46	(2E)	CHARACTER	6	RSRDATE	DATE
52	(34)	CHARACTER	4	RSRTIME	TIME
56	(38)	CHARACTER	6	*	RESERVED FOR ADDITIONAL KEY ...FIELDS
64	(40)	BITSTRING	1	RSRFLAGS	
				RSRDYNADD	ON - DYNADDED
				RSRUPDCON	ON - UPDATED BY CONTROLLER
				*	SPARE
65	(41)	CHARACTER	3	*	SPARE
68	(44)	CHARACTER	4	RSREYEC	EYE CATCHER
72	(48)	SIGNED	4	RSRVERSION	VERSION NUMBER
76	(4C)	CHARACTER	10	RSRTO	IVL END
76	(4C)	CHARACTER	6	RSREDATE	DATE
82	(52)	CHARACTER	4	RSRETIME	TIME
86	(56)	CHARACTER	2	*	SPARE
88	(58)	CHARACTER	48	RSRPARTS	STATS SECTION
88	(58)	SIGNED	4	RSRMAXPLAN	MAXIMUM CONCURRENT PLAN
92	(5C)	SIGNED	4	RSRMAXUSED	MAXIMUM CONCURRENT ALLOCATED
96	(60)	SIGNED	4	RSRIDLETIME	SECONDS IDLE
100	(64)	SIGNED	4	RSRWAITTIME	SECONDS WAITING
104	(68)	SIGNED	4	RSRAVAILTIME	SECONDS AVAILABLE
108	(6C)	SIGNED	4	RSRALCFAIL	ALLOCATION FAILURES
112	(70)	SIGNED	4	RSRCONFAL	WS CONNECT FAILURES
116	(74)	SIGNED	4	*(4)	RESERVED
132	(84)	CHARACTER	1	RSRAVAIL	AVAILABLE (Y/N)
133	(85)	CHARACTER	3	*	RESERVED
136	(88)	CHARACTER		RSREND	END OF OBJECT HEADER

## Cross reference

Name	Hex Offset	Hex Value	Level
RSR	0		1
RSRALCFAIL	6C		3
RSRAVAIL	84		3
RSRAVAILTIME	68		3
RSRCONFAL	70		3
RSRDATE	2E		4
RSRDYNADD	40	80	3
RSREDATE	4C		3
RSREND	88		2
RSRETIME	52		3
RSREYEC	44		2
RSRFLAGS	40		2
RSRFROM	2E		3
RSRID	0		3
RSRIDLETIME	60		3
RSRKEY	0		2
RSRMAXPLAN	58		3
RSRMAXUSED	5C		3
RSRNAME	2		3
RSRPARTS	58		2
RSRTIME	34		4
RSRTO	4C		2
RSRUPDCON	40	40	3
RSRVERSION	48		2
RSRWAITTIME	64		3

## SSX - Subsystem communication vector table extension

Name : DCLSSX

### Function:

This segment maps the Subsystem Extension block (SSX) for the subsystem. The SSX control block is addressed via the SSCTSUSE pointer of the SSCT block mapped by the IEFJSCVT macro. In some cases there are two SSX blocks, the current, active SSX addressed via SSCTSUSE, and the old, inactive SSX addressed by SSCTSUS2. The SSX block is allocated in CSA (subpool 241) in key 0 storage. The SSX block is built by the EQQINIT module during Master Scheduler initialization, or by EQQMAJOR during subsystem initialization when the BUILDSSX keyword has been specified. The active SSX block is freed and the inactive SSX is made active during EQQMAJOR termination when there is an inactive SSX.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	1352	SSX	SSVT EXTENSION BLOCK
SSX BLOCK IDENTIFIER AND CODE LEVEL					
0	(0)	CHARACTER	4	SSXDESC	BLOCK DESCRIPTOR = 'SSX '
4	(4)	CHARACTER	10	SSXLEVEL	SSX BLOCK CODE LEVEL
4	(4)	CHARACTER	2	SSXVER	BLOCK MAPPING VERSION
6	(6)	CHARACTER	8	SSXFMID	TRACKER FMID
14	(E)	SIGNED	2	SSXSIZE	SIZE OF THE SSX BLOCK
STATUS AND OPTION FLAGS					

## SSX - Subsystem communication vector table extension

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
16	(10)	BITSTRING	2	SSXFLAGS	SUBSYSTEM STATUS FLAGS
				SSXJHOLD	1: HOLDJOB(YES) REQUESTED
				SSXSTEPS	1: GENERATE ALL STEP EVENTS
				SSXJSUB	1: JOB SUBMISSION ACTIVE
				SSXJCHLD	1: JCC WANTS HELD DATA
				SSXETT	1: ETT FUNCTION ACTIVE
				SSXHIGHCC	1: USE HIGHEST CC FOR A JOB
				SSXLSTCC	1: USE LAST EXEC STEP'S CC
17	(11)			SSXUHOLD	1: HOLDJOB(USER) REQUESTED
				SSXNZERO	1: GEN ONLY NZERO CC STEP EVENTS
				SSXAR	1: AUTO RECOVERY TASK IS ACTIVE
				*	FREE
				SSXWRN	1: JES SP-LVL WARN MSG ISSUED
				SSXDIAE1	1: DIAGNOSE EVENT WANTED
				SSXSRSRC	1: SR.SRNAME IS A RESOURCE
				*	RESERVED
18	(12)	BITSTRING	4	SSXFLAG2	MORE STATUS FLAGS
				SSXWRN1	1: JES EXIT51 WARN MSG ISSUED
				SSXRLWST	RL.WSSTAT SUBRESOURCE
				SSXRLWSN	RL.WSNAME SUBRESOURCE
				SSXFIPL	1: NO DSLST LOADED FOR IPL
				SSXRLADN	RL.ADNAME SUBRESOURCE
				*	FREE
				SSXJCC	1: JCC STARTED
				*	FREE
22	(16)	CHARACTER	1	SSXJES	JES type A=JES2, B=JES3
23	(17)	CHARACTER	1	SSXCJES	JES COMMAND CHARACTER
24	(18)	CHARACTER	8	SSXNODE	OWN NJE NODE NAME
EQQSSCM LOAD MODULE MANAGEMENT					
32	(20)	CHARACTER	16	SSXSSCM_CUR	CURRENT EQQSSCM LOAD MODULE
32	(20)	CHARACTER	8	SSXCMNAME	EQQSSCM LOAD MODULE NAME
40	(28)	ADDRESS	4	SSXCMCATP	EQQSSCM ENTRY POINT ADDRESS
44	(2C)	ADDRESS	4	SSXCMSSRX	ADDRESS OF EQQZSSRX
48	(30)	CHARACTER	16	SSXSSCM_IPL	PREVIOUSLY LOADED EQQSSCM
48	(30)	CHARACTER	8	SSXCMNAME	
56	(38)	ADDRESS	4	SSXCMCATP	
60	(3C)	ADDRESS	4	SSXCMSSRX	
ALLOCATED RESOURCES					
64	(40)	ADDRESS	4	SSXAREAS	CHAIN OF ALLOCATED CSA AREAS
68	(44)	ADDRESS	4	SSXEVTQ	EVENT WTR QUEUE ADDRESS
72	(48)	ADDRESS	4	SSXSSCMA	PERM LOADED EQQSSCM MODULE ADDR
76	(4C)	SIGNED	4	SSXSSCMS	PERM LOADED EQQSSCM MODULE SIZE
80	(50)	SIGNED	4	SSXNF57A	EQQZNF57 ENF EXIT ADDRESS IN CSA
84	(54)	SIGNED	4	SSXNF57S	EQQZNF57 ENF EXIT SIZE
SSX LABEL OFFSETS ABOVE THIS POINT ARE FIXED. THE ONLY CHANGE ALLOWED IS DEFINING A BIT IN AN EXISTING FLAG BYTE OR MODIFYING ONE OF THE SSX LEVEL CONSTANTS.					
88	(58)	CHARACTER		SSX_END_FIXED	END OF FIXED SSX MAPPING
CONTROL BLOCK ADDRESSES					
88	(58)	ADDRESS	4	SSXMCAP	ADDR OF MCA IN ADDR SPACE



## SSX - Subsystem communication vector table extension

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
92	(5C)	ADDRESS	4	SSXASCB	ASCB ADDRESS
96	(60)	ADDRESS	4	SSXSCT	SCVT ADDRESS
100	(64)	ADDRESS	4	*	RESERVED
104	(68)	ADDRESS	4	SSXDSNEW	DATA SET TRIGGER TABLE
108	(6C)	SIGNED	4	SSXNF41A	EQQZNF41 ENF EXIT ADDRESS IN CSA
112	(70)	SIGNED	4	SSXNF41S	EQQZNF41 ENF EXIT SIZE
SSC STORAGE MANAGEMENT ADDRESSES					
136	(88)	ADDRESS	4	SSXSSCC	ADDR OF FIRST SSC BLOCK
140	(8C)	ADDRESS	4	SSXSSCFR	ADDR OF FIRST FREE SSC
TIVOLI WORKLOAD SCHEDULER MANAGEMENT ADDRESSES					
144	(90)	CHARACTER	8	SSXTWSSERVERN AME	TIVOLI WORKLOAD SCHEDULER SERVER NAME
DBCS OPTIONS					
152	(98)	CHARACTER	8	SSXDBCS	DBCS OPTIONS
152	(98)	CHARACTER	2	SSXSORTO	DBCS SORT ALGORITHM
154	(9A)	CHARACTER	1	SSXADIDF	DBCS: ADID OPTION D OR E
155	(9B)	CHARACTER	1	SSXOWIDF	DBCS: OWNER OPTION D OR E
156	(9C)	CHARACTER	4	*	RESERVED
MISCELLANEOUS FIELDS					
160	(A0)	CHARACTER	8	SSXSJID	STARTED TASK JOB NUMBER
168	(A8)	CHARACTER	8	SSXSJNM	STARTED TASK JOB NAME
176	(B0)	CHARACTER	4	SSXSID	MVS SYSTEM ID
180	(B4)	CHARACTER	4	SSXSSNM	SUBMITTING SUBSYSTEM NAME
184	(B8)	CHARACTER	8	SSXCLAS	RACF RESOURCE CLASS NAME
192	(C0)	CHARACTER	16	SSXJCLLS	JCC SYSOUT CLASSES
208	(D0)	CHARACTER	1	SSXPRTEV	PRTEV: N=NO, '=END, A=ALL
209	(D1)	CHARACTER	1	SSXJES3	JES3 TYPE G=GLOBAL, L=LOCAL
210	(D2)	CHARACTER	1	*	FREE
211	(D3)	CHARACTER	1	*	FREE
212	(D4)	CHARACTER	8	SSXJFMID	JES FMID
220	(DC)	CHARACTER	4	SSXDIAJN	DIAGNOSE JOB/STC NAME
224	(E0)	BITSTRING	4	SSXIECB	JES INPUT SERVICE ECB
228	(E4)	BITSTRING	4	SSXEECB	JES EXECUTION ECB
232	(E8)	UNSIGNED	4	SSXPTKN	CURRENT MGCR PTOKEN
236	(EC)	SIGNED	4	SSXSDTR	SIZE OF DATA TRANSFER AREA
240	(F0)	SIGNED	4	SSXUTIME	TIME OF LAST UERROR EVENT
244	(F4)	SIGNED	4	SSXATIME	TIME OF LAST AERROR EVENT
248	(F8)	SIGNED	4	SSXSZNEW	SIZE OF DS TRIGGER TABLE
252	(FC)	SIGNED	4	*	RESERVED
256	(100)	SIGNED	4	SSXRTOKA	ADDR SPACE RES MGR TOKEN
260	(104)	SIGNED	4	SSXRTOKT	TASK LEVEL RES MGR TOKEN
264	(108)	SIGNED	4	SSX_PIF_CW	PIF CW BASE YEAR
268	(10C)	CHARACTER	6	SSX_PIF_HD	PIF HIGH DATE FORMAT
274	(112)	CHARACTER	5	SSXCLNJOB	STAND-ALONE JOBNAME PREFIX
279	(117)	CHARACTER	1	*	RESERVED
QUEUE ADDRESSES					
280	(118)	CHARACTER	80	SSXQTABLE	QUEUE ADDRESSES
280	(118)	ADDRESS	4	*(20)	ARRAY OF QUEUE ADDRESSES
QUEUE SERVER BLOCKS					
360	(168)	CHARACTER	48	SSXQUES (20)	QUEUE SERVER BLOCKS MAPPED BY DCLQUE
1320	(528)	CHARACTER	32	*	RESERVED SLACK SPACE
1352	(548)	CHARACTER		SSXEND	END OF SSX

## SSX - Subsystem communication vector table extension

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
SCHEDULER QUEUE ARRAY MAPPING WHEN ADDING A NEW QUEUE POINTER, DO NOT REUSE A USED ARRAY ENTRY. THE MAXIMUM ARRAY INDEX THAT CAN BE USED IS DEFINED BY SSXNUMQ. INCREASED SSXNUMQ FOR FUTURE DEVELOPMENT					

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
280	(118)	STRUCTURE	80	SSXQPTRS	ARRAY OF QUEUE ADDRESSES
280	(118)	ADDRESS	4	*	RESERVED BY EVENT WRITER 1
284	(11C)	ADDRESS	4	SSXGENQ	GEN SERVICE QUEUE 2
288	(120)	ADDRESS	4	SSXJCCQ	JCC SERVICE QUEUE 3
292	(124)	ADDRESS	4	SSXMGRQ	EVENT MGR QUEUE 4
296	(128)	ADDRESS	4	SSXMSGQ	MAJOR MSG QUEUE 5
300	(12C)	ADDRESS	4	SSXAPPQ	APPC QUEUE 6
304	(130)	ADDRESS	4	SSXRTRQ	ROUTER QUEUE 7
308	(134)	ADDRESS	4	*	FREE
312	(138)	ADDRESS	4	SSXSUBQ	JOB SUBMIT QUEUE 9
316	(13C)	ADDRESS	4	SSXNCFQ	NCF QUEUE 10
320	(140)	ADDRESS	4	SSXEXQ	EXA QUEUE 11
324	(144)	ADDRESS	4	*	FREE
328	(148)	ADDRESS	4	SSXRODQ	RODM QUEUE 13
332	(14C)	ADDRESS	4	SSXATRQ	APPC TRACKER QUEUE 14
336	(150)	ADDRESS	4	SSXSRVQ	SERVER QUEUE 15
340	(154)	ADDRESS	4	SSXARCQ	FL TASK QUEUE 16
344	(158)	ADDRESS	4	SSXPSUQ	PSU TASK QUEUE
348	(15C)	ADDRESS	4	SSXTWSQ	TIVOLI WORKLOAD SCHEDULER TASK QUEUE
352	(160)	ADDRESS	4	SSXMONQ	MON TASK QUEUE
356	(164)	ADDRESS	4	*(6)	FREE

## Cross reference

Name	Hex Offset	Hex Value	Level
SSX	0		1
SSX_END_FIXED	58		2
SSX_PIF_CW	108		2
SSX_PIF_HD	10C		2
SSXADIDF	9A		3
SSXAPPQ	12C		2
SSXAR	11	40	3
SSXARCQ	154		2
SSXAREAS	40		2
SSXASCB	5C		2
SSXATIME	F4		2
SSXATRQ	14C		2
SSXCJES	17		2
SSXCLAS	B8		2
SSXCLNJOB	112		2
SSXCMCATP	28		3
SSXCMCATP	38		3
SSXCMNAME	30		3
SSXCMNAME	20		3

## SSX - Subsystem communication vector table extension

Name	Hex Offset	Hex Value	Level
SSXCMSRX	3C		3
SSXCMSRX	2C		3
SSXDBCS	98		2
SSXDESC	0		2
SSXDIAE1	11	08	3
SSXDIAJN	DC		2
SSXDSNEW	68		2
SSXE ECB	E4		2
SSXEND	548		2
SSXETT	10	08	3
SSXEVTQ	44		2
SSSEXQ	140		2
SSXFIPL	12	10	3
SSXFLAGS	10		2
SSXFLAG2	12		2
SSXFMID	6		3
SSXFTWJSUB	11	02	3
SSXGENQ	11C		2
SSXHGHC	10	04	3
SSXIECB	E0		2
SSXJCC	12	02	4
SSXJCLS	C0		2
SSXJCCQ	120		2
SSXJCHLD	10	10	3
SSXJES	16		2
SSXJES3	D1		2
SSXJFMID	D4		2
SSXJHOLD	10	80	3
SSXJSUB	10	20	3
SSXLEVEL	4		2
SSXLSTCC	10	02	3
SSXMCAP	58		2
SSXMGRQ	124		2
SSXMONQ	160		2
SSXMSGQ	128		2
SSXNCFQ	13C		2
SSXNF41A	6C		2
SSXNF41S	70		2
SSXNF57A	50		2
SSXNF57S	54		2
SSXNODE	18		2
SSXNZERO	11	80	3
SSXOWIDF	9B		3
SSXPRTEV	D0		2
SSXPSUQ	158		2
SSXPSUG	158		2
SSXPTKN	E8		2
SSXQPTRS	118		1
SSXQTABLE	118		2
SSXQUES	168		2
SSXRLWSN	12	20	3

## SSX - Subsystem communication vector table extension

Name	Hex Offset	Hex Value	Level
SSXRLWST	12	40	3
SSXRODQ	148		2
SSXRPASS	11	01	3
SSXRTOKA	100		2
SSXRTOKT	104		2
SSXRTRQ	130		2
SSXSDTR	EC		2
SSXSID	B0		2
SSXSIZE	E		2
SSXSJID	A0		2
SSXSJNM	A8		2
SSXSORTO	98		3
SSXSRSRC	11	04	3
SSXSRVQ	150		2
SSXSSCC	88		2
SSXSSCFR	8C		2
SSXSSCM_CUR	20		2
SSXSSCM_IPL	30		2
SSXSSCMA	48		2
SSXSSCMS	4C		2
SSXSSCT	60		2
SSXSSNM	B4		2
SSXSTEPS	10	40	3
SSXSUBQ	138		2
SSXSZNEW	F8		2
SSXTAQ	144		2
SSXTWSQ	15C		2
SSXTWSSERVERNAME	90		2
SSXUHOLD	10	01	3
SSXUTIME	F0		2
SSXVER	4		3
SSXWRN	11	10	3
SSXWRN1	12	80	3

## TOC - Table of contents for DP reports

Name : DCLTOC

Function:

This segment declares the table of contents record in a daily plan report.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	52	TABCONT	TABLE OF CONTENTS (DP)	
0	(0)	CHARACTER	4	TABGIM	GENERAL INFORMATION	
4	(4)	CHARACTER	4	TABDOP	DAILY OPERATION PLAN	
8	(8)	ADDRESS	4	TABWS	WORKSTATION(S) PLANS	
12	(C)	CHARACTER	4	TABSUM	SUMMARY OF COMPLETED APPL	
16	(10)	CHARACTER	4	TABCMP	COMPLETED APPLICATIONS	
20	(14)	CHARACTER	4	TABOPE	OPERATION IN ERROR	
24	(18)	CHARACTER	4	TABWSU	WORKSTATION UTILIZATION	

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
28	(1C)	CHARACTER	4	TABERS	ERROR STATISTICS
32	(20)	CHARACTER	4	TABFBR	MISSED FEEDBACK
36	(24)	CHARACTER	4	TABHPR	PLANNED RES UTIL HISTO
40	(28)	CHARACTER	4	TABPRU	PLANNED RES UTIL REPORT
44	(2C)	CHARACTER	4	TABARU	ACTUAL RES UTIL REPORT
48	(30)	CHARACTER	4	TABMST	MESSAGES
52	(34)	CHARACTER	4	TABCRI	CRITICAL PATH

### Cross reference

Name	Hex Offset	Hex Value	Level
TABARU	2C		2
TABCMP	10		2
TABCONT	0		1
TABCRI	34		2
TABDOP	4		2
TABERS	1C		2
TABFBR	20		2
TABGIM	0		2
TABHPR	24		2
TABMST	30		2
TABOPE	14		2
TABPRU	28		2
TABSUM	C		2
TABWS	8		2
TABWSU	18		2

### TRG - Data set trigger table layout

Name : DCLTRG

Function:

This segment maps EQQEVLIB members, that are input data for the controller, and the EQQEVLST member of EQQJCLIB, that is input data for the tracker. The mapping varies depending on the type of the specific item in the triggering selection table, that is one of the following:

Header

Trigger condition

Filter criteria

Filter value

Action

Special resource related information

Data loaded in Common Service Area (CSA), mapped by TRGTABLEHEADER and following structures.

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	8	TRGITABLEHEADER	
0	(0) CHARACTER	1	TRGITABLECHECK	=0 ALWAYS
1	(1) CHARACTER	1	TRGITABLEVERSION	
2	(2) CHARACTER	1	TRGITABLERELEASE	
3	(3) CHARACTER	1	*	BLANK
4	(4) CHARACTER	4	TRGITABLECRC	CRC IDENTIFYING THE TABLE C MUST BE WORD ALLIGNED

Offsets	Type	Length	Name	Description
---------	------	--------	------	-------------

## TRG - Data set trigger table layout

0	(0)	STRUCTURE	9	TRGICONDITION	
0	(0)	CHARACTER	1	TRGICONDMONITOR	S FOR SMF
1	(1)	CHARACTER	1	TRGICONDDRAFT	D OR BLANK
2	(2)	CHARACTER	3	TRGICONDDTYPE	CONDITION TO BE TESTED
5	(5)	CHARACTER	1	*	BLANK
6	(6)	CHARACTER	3	TRGICONDFILTERSNUMBER	
9	(9)	CHARACTER		TRGICONDDATA	

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	11	TRGIFILTER	
0	(0)	CHARACTER	1	*	;
1	(1)	CHARACTER	3	TRGIFILTERFIELD	
4	(4)	CHARACTER	1	*	BLANK
5	(5)	CHARACTER	1	TRGIFILTERVALUESNUMBERIDENT	
6	(6)	CHARACTER	2	TRGIFILTERVALUESNUMBER	
8	(8)	CHARACTER	2	TRGIFILTEROPERATOR	==, <>, >=, <= ><(RANGE)
10	(A)	CHARACTER	1	TRGIFILTEROREAND	
11	(B)	CHARACTER		TRGIFILTERDATA	

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	*	TRGIFILTERVALUE	
0	(0)	CHARACTER	1	*	BLANK
1	(1)	CHARACTER	3	TRGIFILTERVALUELEN	
4	(4)	CHARACTER	1	*	:
5	(5)	CHARACTER	3	TRGIFILTERVALUEOFFSET	
8	(8)	CHARACTER	1	*	:
9	(9)	CHARACTER	*	TRGIFILTERVALUESTR	

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	4	TRGIACTION	
0	(0)	CHARACTER	1	*	;
1	(1)	CHARACTER	2	TRGIACTIONTYPE	ACTION INDICATOR
3	(3)	CHARACTER	1	*	BLANK
4	(4)	CHARACTER		TRGIACTIONINFO	

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	9	TRGISRSTATACTIONINFO	
0	(0)	CHARACTER	1	TRGISRAVAILABILITY	
1	(1)	CHARACTER	1	TRGISRLIFACTION	
2	(2)	CHARACTER	5	TRGISRLIFTIME	
7	(7)	CHARACTER	2	*	:: THIS FIELD IDENTIFY THE END OF CONDITION.....

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	4	TRGTABLEHEADER	
0	(0)	CHARACTER	4	TRGTABLECRC	
4	(4)	CHARACTER		TRGTABLEDATA	

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	5	TRGCONDITION	
0	(0)	UNSIGNED	1	TRGCONDMONITOR	
1	(1)	UNSIGNED	1	TRGCONDTYPE	
2	(2)	UNSIGNED	2	TRGCONDNEXTOFFSET	
4	(4)	UNSIGNED	1	TRGCONDFILTERSNUMBER	
5	(5)	CHARACTER		TRGCONDDATA	

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	2	TRGFILTER	GENERIC EVENT FILTER
0	(0)	UNSIGNED	1	TRGFILTERFIELD	FIELD IN SMF RECORD
1	(1)	1111 ....		TRGFILTERVALUESNUMBER	
		.... 111.		TRGFILTEROPERATOR	

2 (2) CHARACTER TRGFILTEROREAND TRGFILTERDATA START OF VALUES

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	*	TRGFILTERVALUE	
0	(0) UNSIGNED	1	TRGFILTERVALUELEN	
1	(1) UNSIGNED	1	TRGFILTERVALUEOFFSET	
2	(2) CHARACTER	*	TRGFILTERVALUESTR	

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	1	TRGACTION	
1111	....		TRGACTIONTYPE	

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	6	TRGSRSTATACTION	NOT USED
1111	....		*	

### Cross reference

HEX NAME	HEX	OFFSET	VALUE	LEVEL
TRGACTION		0		1
TRGACTIONTYPE		0	F0	2
TRGCONDDATA		5		2
TRGCONDFILTERSNUMBER		4		2
TRGCONDITION		0		1
TRGCONDMONITOR		0		2
TRGCONDNEXTOFFSET		2		2
TRGCONDTYPE		1		2
TRGFILTER		0		1
TRGFILTERDATA		2		2
TRGFILTERFIELD		0		2
TRGFILTEROPERATOR		1	0E	2
TRGFILTEROREAND		1	01	2
TRGFILTERVALUE		0		1
TRGFILTERVALUELEN		0		2
TRGFILTERVALUEOFFSET		1		2
TRGFILTERVALUESNUMBER		1	F0	2
TRGFILTERVALUESTR		2		2
TRGIACTION		0		1
TRGIACTIONINFO		4		2
TRGIACTIONTYPE		1		2
TRGICONDDATA		9		2
TRGICONDDRAFT		1		2
TRGICONDFILTERSNUMBER		6		2
TRGICONDITION		0		1
TRGICONDMONITOR		0		2
TRGICONDDTYPE		2		2
TRGIFILTER		0		1
TRGIFILTERDATA		B		2
TRGIFILTERFIELD		1		2
TRGIFILTEROPERATOR		8		2
TRGIFILTEROREAND		A		2
TRGIFILTERVALUE		0		1
TRGIFILTERVALUELEN		1		2
TRGIFILTERVALUEOFFSET		5		2
TRGIFILTERVALUESNUMBER		6		2
TRGIFILTERVALUESNUMBERIDENT		5		2
TRGIFILTERVALUESTR		9		2
TRGISRAVAILABILITY		0		2
TRGISRLIFACTION		1		2
TRGISRLIFTIME		2		2
TRGISRSTATACTIONINFO		0		1
TRGITABLECHECK		0		2
TRGITABLECRC		4		2
TRGITABLEHEADER		0		1

## TRG - Data set trigger table layout

TRGITABLERELEASE	2		2
TRGITABLEVERSION	1		2
TRGSRVAVAILABILITY	0	0C	2
TRGSRLIFACTION	0	03	2
TRGSRLIFTIME	1		2
TRGSRSTATACTION	0		1
TRGTABLECRC	0		2
TRGTABLEDATA	4		2
TRGTABLEHEADER	0		1

---

## TRL - Job-tracking and audit record

Name : DCLTRL

Function:

This segment maps tracklog records in:

1. The JT log data sets. There are at least two such data sets.
2. The JT log backup data sets. These data sets are optional.
3. The JT log archive data set. This data set is required.
4. The tracklog data set. This data set is optional.

JT log data sets are created by an active controller system. The tracklog data set is created by a Daily Plan batch job. The Daily Plan batch job (plan next period and replan current period) will copy the contents of the archive JT log to the tracklog data set.

The job also copies all new current plan records type 01, 02 and 03 onto the tracklog data set.

It can optionally contain record types 01, 02, 03, and 04 from the old current plan data set.

The tracklog data set is normally allocated disp=mod by the Daily Plan batch job.

Note: In the JT log, 6-char dates appear in the internal date format, which uses 1972 as the century window base year. This means that the year 1972 is represented as 00.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	TRLREC	
0	(0)	CHARACTER	52	TRLCOM	COMMON SECTION
0	(0)	SIGNED	2	TRLSIZE	SIZE OF THIS RECORD
2	(2)	UNSIGNED	2	TRLBDW	ALWAYS ZEROES
4	(4)	CHARACTER	3	TRLOPC	SHOULD ALWAYS CONTAIN 'OPC'
7	(7)	CHARACTER	2	TRLLOGID	CURR ID OF THIS SCHEDULER LOG.
9	(9)	CHARACTER	2	TRLRCTYP	RECORD TYPE
11	(B)	UNSIGNED	1	TRLRCVER	RECORD MAPPING VERSION.
12	(C)	CHARACTER	4	TRLEV DAT	EVENT DATE, FORMAT 0CYYDDF
16	(10)	UNSIGNED	4	TRLEVTIM	EVENT TIME, FORMAT HHMMSSSTH
20	(14)	CHARACTER	19	TRLCPKEY	CONTAINS CURRENT PLAN KEY FOR TYPE 01, 02, 03
20	(14)	CHARACTER	6	*	OPERATION RECORD KEY PRESENT FOR 23,26,29,33 REC
20	(14)	SIGNED	4	TRLCPEUT	ELAPSED TIME FOR MCP PRESENT FOR TYPE 24 REC
26	(1A)	CHARACTER	8	TRLUSER	DIALOG USER NAME
34	(22)	UNSIGNED	2	TRLSSEQ#	SUBMIT SEQ NUMBER PRESENT FOR TYPE 25 REC
39	(27)	CHARACTER	1	TRLFILL	FLAGS
				TRLFIRST	FIRST OF A SERIES OF RECS
				TRLLAST	LAST OF A SERIES OF RECS
				TRLSTC	LOG REC IS FOR STC OPER
				TRLWTO	LOG REC IS FOR WTO OPER
				TRLRESUB	RE-SUBMIT: TYPE 25



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				TRLJRPFL	ETT JNR=Y MATCHED EV'T
				TRLOLDCP	FROM OLD CURRENT PLAN
				TRLJRNFL	ETT JNR=N MATCHED EV'T
40	(28)	SIGNED	4	TRLLENGT	TOTAL SIZE OF LOGGED EVT
44	(2C)	SIGNED	4	TRLGMTOF	GMT OFFSET
48	(30)	CHARACTER	1	TRLFILL2	FLAGS
		1... ..		TRLCKPTR	PERFORMING CKPT REFRESH
		.1... ..		TRLSA	SA SUBMISSION
		..11 1111		*	RESERVED
				*	RESERVED
49	(31)	CHARACTER	3	*	RESERVED
52	(34)	CHARACTER	*	TRLRCBDY	END OF COMMON SECTION

### JT started TRLBODY20

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	1	TRLBODY20	BODY OF JT STARTED EVENT
52	(34)	CHARACTER	1	TRLMOD20	MODE JT WAS STARTED IN T (TRACK) OR U (UPDATE)

### Operation event TRLBODY23

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	72	TRLBODY23	BODY OF OPERATION EVENT
52	(34)	CHARACTER	16	TRLADI23	AD ID FOR OCCURRENCE
68	(44)	CHARACTER	6	TRLIAD23	MOD INPUT ARR DATE
74	(4A)	CHARACTER	4	TRLIAT23	MOD INPUT ARR TIME
78	(4E)	CHARACTER	6	TRLOID23	OPERATION ID
78	(4E)	CHARACTER	4	TRLWSN23	WORKSTATION NAME
82	(52)	SIGNED	2	TRLOPN23	OPERATION NUMBER
84	(54)	CHARACTER	1	TRLEVT23	NEW OPERATION STATUS OR 'X' = RESET STATUS
85	(55)	CHARACTER	6	TRLDUR23	REPORTED DURATION
91	(5B)	CHARACTER	4	TRLERC23	REPORTED ERROR CODE
95	(5F)	CHARACTER	1	*	VARIOUS FLAGS
				TRLFDB23	ON = OCC. IS COMPLETED
				TRLBYP23	ON = BYPASS DURING RESTART
				TRLMAN23	ON = STATUS SET MANUALLY (GS)
				TRLX23	ON = STATUS X SET
				*	RESERVED
96	(60)	CHARACTER	16	TRLOWI23	OWNER ID
112	(70)	CHARACTER	8	TRLJBN23	JOBNAME
120	(78)	UNSIGNED	4	TRLDURS23	DURATION IN 100TH OF SEC
124	(7C)	CHARACTER	8	TRLREADY23	START TIME WAIT OPR

## TRL - Job-tracking and audit record

### MCP event TRLBODY24

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	*	TRLBODY24	BODY OF MCP-EVENT
52	(34)	CHARACTER	*	TRLMT024	MAPPED BY DCLMT0

### Submit event TRLBODY25

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	80	TRLBODY25	BODY OF SUBMIT EVENT
52	(34)	CHARACTER	16	TRLAID25	AD ID FOR OP
68	(44)	CHARACTER	10	TRLIA25	OCC INPUT ARRIVAL
68	(44)	CHARACTER	6	TRLIAD25	MOD INPUT ARR DATE
74	(4A)	CHARACTER	4	TRLIAT25	MOD INPUT ARR TIME
78	(4E)	CHARACTER	8	TRLJID25	BLANK FOR SUB OR 'RELEASE'
86	(56)	CHARACTER	8	TRLDDN25	SU/RE DDNAME OR ZERO
94	(5E)	CHARACTER	8	TRLJNM25	JOB NAME
102	(66)	CHARACTER	8	TRLUSR25	USER ID OR 'OPC'
110	(6E)	BITSTRING	1	TRLFLAG	
				TRLWASUJ	ON=SUBMITTED BY EQQWASUJ
				TRLRER25	ON=IT WAS REROUTED
				*	FREE
111	(6F)	CHARACTER	1	*	FREE
112	(70)	CHARACTER	8	TRLTOK_FULL25	OPERATION TOKEN
112	(70)	CHARACTER	4	TRLTOK_PRE25	TOKEN PREFIX
116	(74)	UNSIGNED	4	TRLTOK25	TOKEN VALUE
120	(78)	CHARACTER	8	TRLSUBTOKEN25	SUBMISSION TOKEN
128	(80)	CHARACTER	4	TRLALTWS25	ALTERNATE WS FOR REROUTED

### Automatic recovery event TRLBODY26

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	27	TRLBODY26	BODY OF AUTO RECOVERY
52	(34)	CHARACTER	16	TRLAID26	AD ID FOR OP
68	(44)	CHARACTER	10	TRLIA26	OCC INPUT ARRIVAL
78	(4E)	CHARACTER	1	TRLXST26	NEW EXTENDED STATUS

### Missed feedback event TRLBODY27

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	43	TRLBODY27	BODY OF MISSED FEEDBACK REC
52	(34)	CHARACTER	16	TRLAID27	AD ID FOR OP
68	(44)	CHARACTER	6	TRLIAD27	MOD INPUT ARR DATE
74	(4A)	CHARACTER	4	TRLIAT27	MOD INPUT ARR TIME
78	(4E)	CHARACTER	6	TRLOID27	OPERATION ID
84	(54)	CHARACTER	4	TRLEDU27	ESTIMATED DURATION
88	(58)	CHARACTER	6	TRLADU27	ACTUAL DURATION

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
94	(5E)	CHARACTER	1	TRLRES27	REASON FOR MISSED FEEDBACK: 1 = LIMIT EXCEEDED 2 = AD RECORD IN USE 3 = NOT ENOUGH SPACE 4 = I/O PROBLEMS 5 = DL BEFORE IA 6 = NO RUN CYCLE FOUND
95	(5F)	CHARACTER	1	TRLORIG27	ORIGIN FOR MISSED FEEDBACK: 1 = OPERATION DURATION 2 = OPERATION DEADLINE 3 = OCCURRENCE DEADLINE
96	(60)	SIGNED	2	TRLRID27	RUN CYCLE ID
98	(62)	CHARACTER	6	TRLEDL27	ESTIMATED DEADLINE
98	(62)	CHARACTER	2	TRLELDL27	DAY OFFSET DD
100	(64)	CHARACTER	4	TRLEDLT27	TIME HHMM
104	(68)	CHARACTER	10	TRLADL27	ACTUAL DEADLINE
104	(68)	CHARACTER	6	TRLADLD27	DATE YYMMDD
110	(6E)	CHARACTER	4	TRLADLT27	TIME HHMM

### Feedback record TRLB DY28

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	*	TRLB DY28	BODY OF FEEDBACK RECORD
52	(34)	CHARACTER	16	TRLAID28	AD ID FOR OCC
68	(44)	CHARACTER	6	TRLIAD28	MOD INPUT ARR DATE
74	(4A)	CHARACTER	4	TRLIAT28	MOD INPUT ARR TIME
78	(4E)	CHARACTER	6	TRLODL28	RUN CYCLE OLD DEADLINE
78	(4E)	CHARACTER	2	TRLODLD28	DAY OFFSET DD
80	(50)	CHARACTER	4	TRLODLT28	TIME HHMM
84	(54)	CHARACTER	6	TRLADL28	RUN CYCLE ACTUAL DEADLINE
84	(54)	CHARACTER	2	TRLADLD28	DAY OFFSET DD
86	(56)	CHARACTER	4	TRLADLT28	TIME HHMM
90	(5A)	SIGNED	2	TRLRID28	RUN CYCLE ID
92	(5C)	SIGNED	2	TRL#OPDL28	NUMBER OF OPERATIONS UPDATED FOR DEADLINE
94	(5E)	SIGNED	2	TRL#OPDU28	NUMBER OF OPERATIONS UPDATED FOR DURATION
96	(60)	SIGNED	2	TRL#OP28	NUMBER OF OPS UPDATED
98	(62)	CHARACTER	26	TRLOPS28 (*)	UPDATED OPERATIONS
98	(62)	CHARACTER	6	TRLOPI28	OPERATION ID
104	(56)	CHARACTER	4	TRLODU28	OLD DURATION
108	(5A)	CHARACTER	4	TRLADU28	ACTUAL DURATION
112	(70)	CHARACTER	6	TRLOPDL28	OPERATION OLD DEADLINE
112	(70)	CHARACTER	2	TRLOPDL28	DAY OFFSET DD
114	(72)	CHARACTER	4	TRLOPDLT28	TIME HHMM
118	(76)	CHARACTER	6	TRLOPADL28	OPERATION ACTUAL DEADLINE
118	(76)	CHARACTER	2	TRLOPADLD28	DAY OFFSET DD
120	(78)	CHARACTER	4	TRLOPADLT28	TIME HHMM

## TRL - Job-tracking and audit record

### Automatically-tracked event record TRLDY29

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	*	TRLDY29	AUTO TRACKED EVENT
52	(34)	CHARACTER	1	TRLTYP29	EVENT LOGGING REASON 1: EVENT WAS PROCESSED 2: EVENT WAS SUSPENDED
53	(35)	CHARACTER	*	TRLEXR29	EVENT RECORD (SEE DCLEQE)
CODE CHANGED BELOW					

### Special resource event record TRLDY30

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	*	TRLDY30	SPECIAL RESOURCE EVENT
52	(34)	CHARACTER	1	TRLTYP30	TYPE OF RECORD: R: RESOURCE RECORD E: EXS EVENT RECORD A: ACTUAL REPORT RECORD (RSRR)
53	(35)	CHARACTER	1	TRLREQ30	REQUEST TYPE U: UPDATE A RESOURCE A: ADD A RESOURCE
54	(36)	CHARACTER	1	TRLFLA30	FLAGS
				TRLSRS30	ON= SRSTAT CHANGE
				*	RESERVED
55	(37)	CHARACTER	1	*	RESERVED
56	(38)	CHARACTER	*	TRLRSR30	DATA PART

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
56	(38)	STRUCTURE	*	TRLEXS30	EVENT MAPPING
56	(38)	SIGNED	4	TRLNODE30	NODE NUMBER
60	(3C)	SIGNED	4	TRLRDRN30	EVENT READER NUM IN NODE
64	(40)	CHARACTER	8	TRLPOS30	EVENT DS POSITION
64	(40)	SIGNED	4	TRLCYC#30	WRITE CYCLE NUMBER
68	(44)	SIGNED	4	TRLREC#30	RECORD NUMBER IN CYCLE
72	(48)	CHARACTER	*	TRLEXSR30	EVENT RECORD SEE DCLEXS
CODE CHANGED ABOVE					

### ETT criteria update record TRLDY31

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	*	TRLDY31	ETT TAB FILE MAINT EV
52	(34)	CHARACTER	1	TRLTYP31	EVENT LOGGED BY 2: GENERAL SERVICE
53	(35)	CHARACTER	1	TRLREQ31	REQUEST TYPE U: UPDATE A CRITERIA I: ADD A CRITERIA D: DELETE A CRITERIA
54	(36)	CHARACTER	*	TRLETC31	ETT REC (SEE DCLETC)

**Audit trail record TRLBDY32**

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	*	TRLBDY32	AUDIT TRAIL LOG RECORD
52	(34)	SIGNED	2	TRLKLN32	SIZE OF KEY
54	(36)	SIGNED	2	TRLREC32	AMOUNT OF DATA THIS RECORD
56	(38)	SIGNED	4	TRLTOT32	TOTAL DATA SIZE
60	(3C)	SIGNED	4	TRLREM32	REMAINING DATA SIZE
64	(40)	CHARACTER	4	TRLFIL32	LOGICAL FILE NAME
68	(44)	CHARACTER	1	TRLACC32	ACCESS TYPE R: READ ACCESS U: UPDATE ACCESS I: ADD A RECORD D: RECORD DELETED
69	(45)	BITSTRING	3	TRLRSV32	NOT USED
72	(48)	CHARACTER	64	TRLKEY32	RECORD KEY + BLANKS
72	(48)	CHARACTER	28	*	RESERVED
100	(64)	CHARACTER	8	TRLLIB32	LIBRARY READ FROM
108	(6C)	CHARACTER	8	TRLMEM32	JCL MEMBER READ
116	(74)	CHARACTER	20	*	RESERVED
136	(88)	CHARACTER	*	TRLDAT32	RECORD DATA

**WSA alert record TRLBDY33**

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	71	TRLBDY33	WSA INFO MSG LOG REC
52	(34)	CHARACTER	16	TRLAID33	AD ID FOR OP
68	(44)	CHARACTER	10	TRLIA33	OCC INPUT ARRIVAL
68	(44)	CHARACTER	6	TRLIAD33	MOD INPUT ARR DATE
74	(4A)	CHARACTER	4	TRLIAT33	MOD INPUT ARR TIME
78	(4E)	CHARACTER	1	TRLMSG33	TYPE OF MESSAGE ISSUED: L = LATE OPERATION WALTE D = LONG DURATION WALTE R = RESOURCE CONT. QQALR W = WTO WAWTO U = URGENT QUEUE PROMOTION N = URGENT QUEUE DEPROMOT. P = WLM PROMOTION F = WLM PROM. FAILURE MSG
79	(4F)	CHARACTER	44	TRLNAM33	RESOURCE NAME

**Catalog management event record TRLBDY34**

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	155	TRLBDY34	CAT MGT EVENT INFORMATION
52	(34)	CHARACTER	8	TRLJNM34	JOB NAME
60	(3C)	CHARACTER	8	TRLJID34	JOB ID
68	(44)	CHARACTER	8	TRLNOD34	NODE ID
76	(4C)	CHARACTER	16	TRLADI34	APPLICATION ID
92	(5C)	CHARACTER	10	TRLIAT34	INPUT ARRIVAL

## TRL - Job-tracking and audit record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
102	(66)	CHARACTER	1	TRLACT34	CAT MGT ACTION R = DATASET RECATALOGED U = DATASET UNCATALOGED D = DATASET DELETED M = DS WAITING FOR MIGRAT E = CATALOG RETURN ERROR
103	(67)	CHARACTER	8	TRLSTP34	PROC STEPNAME OR BLANK
111	(6F)	CHARACTER	8	TRLDDN34	DD NAME
119	(77)	CHARACTER	44	TRLDSN34	DATASET NAME
163	(A3)	CHARACTER	44	TRLCAT34	CATALOG NAME, BLANK IF MASTER CAT

## Backup event record TRLB DY35

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	40	TRLB DY35	BACKUP EVENT
52	(34)	CHARACTER	2	TRLRES35	RESOURCE DSN NAME
54	(36)	BITSTRING	1	TRLFL135	FLAG BYTE 1
				TRLDPA35	DP ACTIVE, CP BKUP IGNORED
				*	RESERVED
55	(37)	CHARACTER	1	*	RESERVED
56	(38)	CHARACTER	8	TRLUSR35	REQUESTING USER ID
64	(40)	CHARACTER	8	TRLMJS35	MISCELLANEOUS JS VALUES
64	(40)	SIGNED	4	TRLOPT35	MAX JS SIZE IN BYTES
68	(44)	SIGNED	4	TRLCNT35	NUM OF INSERTS ON JS
72	(48)	CHARACTER	4	TRLMCP35	MISCELLANEOUS CP VALUES
72	(48)	SIGNED	2	TRLLIM35	BACKUP TRK RECORDS LIMIT
74	(4A)	SIGNED	2	TRLTOT35	TRK RECORDS SINCE BACKUP
76	(4C)	SIGNED	4	TRLNODE35	NODE NUMBER
80	(50)	SIGNED	4	TRLRDRN35	EVENT READER NUM IN NODE
84	(54)	CHARACTER	8	TRLPOS35	EVENT DS POSITION
84	(54)	SIGNED	4	TRLCYC#35	WRITE CYCLE NUMBER
88	(58)	SIGNED	4	TRLREC#35	RECORD NUMBER IN CYCLE

## CP backup record TRLB DY36

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	16	TRLB DY36	CP BACKUP LOG RECORD
52	(34)	CHARACTER	8	TRLCPDD36	DDNAME OF BACKED UP DS
60	(3C)	CHARACTER	8	TRLJTDD36	DD OF THIS JT DATASET

## Log data record TRLB DY37

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	*	TRLB DY37	LOG DATA
52	(34)	CHARACTER	4	TRLTYP37	TYPE OF DATA LOGGED
56	(38)	SIGNED	4	TRLSIZE37	SIZE OF DATA LOGGED
60	(3C)	CHARACTER	*	TRLDATA37	DATA PART

## Automatic recovery RESSTEP record TRLBODY38

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	48	TRLBODY38	BODY OF AR RESSTEP DATA
52	(34)	CHARACTER	16	TRLAID38	AD ID FOR OP
68	(44)	CHARACTER	10	TRLIA38	OCC INPUT ARRIVAL
78	(4E)	CHARACTER	2	*	RESERVED
80	(50)	CHARACTER	20	TRLARINFO	AR RESTART STEP DATA
80	(50)	SIGNED	4	TRLARSTN	STEP NUMBER
84	(54)	CHARACTER	8	TRLARSTEP	STEP NAME
92	(5C)	CHARACTER	8	TRLARPSTEP	PROCSTEP NAME

## Log data record TRLBODY39

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
52	(34)	STRUCTURE	32	TRLBODY39	BULKDISC EVENT
52	(34)	BITSTRING	1	TRLFL139	FLAG BYTE 1
		1... ..		TRLDPA39	DP ACTIVE, CURRENT PLAN BACKUP IGNORED
		.111 1111		*	RESERVED
53	(35)	CHARACTER	3	*	RESERVED
56	(38)	CHARACTER	8	TRLUSR39	REQUESTING USER ID
64	(40)	CHARACTER	4	TRLMCP39	MISCELLANEOUS CP VALUES
64	(40)	SIGNED	2	TRLLIM39	BACKUP TRK RECORDS LIMIT
66	(42)	SIGNED	2	TRLTOT39	TRK RECORDS SINCE BACKUP
68	(44)	SIGNED	4	TRLNODE39	OPC NODE NUMBER
72	(48)	SIGNED	4	TRLRDRN39	EVENT READER NUM IN MODE
76	(4C)	CHARACTER	8	TRLPOS39	EVENT DS POSITION
76	(4C)	SIGNED	4	TRLCYC#39	WRITE CYCLE NUMBER
80	(50)	SIGNED	4	TRLREC#39	RECORD NUMBER IN CYCLE

## Log data record TRLBODY40

Offsets					
Dec	Hex	Type	Len	Name	Description
52	(34)	STRUCTURE	56	TRLBODY40	BODY OF CP66 EVENT INF
52	(34)	CHARACTER	16	TRLADI40	OCCURRENCE NUMBER
68	(44)	CHARACTER	10	TRLIA40	
68	(44)	CHARACTER	6	TRLIAD40	
74	(4A)	CHARACTER	4	TRLIAT40	
78	(4E)	CHARACTER	6	TRLOID40	
78	(4E)	CHARACTER	4	TRLWSN40	
82	(52)	SIGNED	2	TRLOPN40	
84	(54)	SIGNED	4	TRLSEQN40	CP66 SEQUENCE NUMBER
88	(58)	SIGNED	4	TRLRNREC40	NBR OF PATH RECALC
92	(5C)	CHARACTER	1	TRLTRG40	PATH RECALC TRIGGER
93	(5D)	CHARACTER	1	*	RESERVED
94	(5E)	CHARACTER	10	TRLREC40	LAST RECALCULATION
94	(5E)	CHARACTER	6	TRLREC40D	DATE
100	(64)	CHARACTER	4	TRLREC40T	TIME
104	(68)	CHARACTER	4	TRLTYPE40	REQ TYPE: DEL/ADD/UPD

**Note:** Each record tracks a critical path recalculation or a critical job dynamically added to or deleted from the critical job table, according to the value of trl type40 field.

## TRL - Job-tracking and audit record

### Time zone exit event TRLB DY41

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	40	TRLBDY41	BODY OF TZONE EVENT
52	(34)	CHARACTER	16	TRLAID41	APPLICATION ID
68	(44)	CHARACTER	10	TRLIA41	OCCURRENCE INPUT ARRIVAL
78	(4E)	SIGNED	2	TRLTZOFF41	TIME ZONE OFFSET
80	(50)	CHARACTER	12	*	FREE

### Log data record TRLB DY42

Offsets	Dec	Hex	Type	Len	Name	Description
	52	(34)	STRUCTURE	40	TRLBDY42	BODY OF EVENT INFO
	52	(34)	CHARACTER	16	TRLADI42	OCCURRENCE NUMBER
	68	(44)	CHARACTER	10	TRLIA42	
	68	(44)	CHARACTER	6	TRLIAD42	
	74	(4A)	CHARACTER	4	TRLIAT42	
	78	(4E)	CHARACTER	6	TRLOID42	
	78	(4E)	CHARACTER	4	TRLWSN42	
	82	(52)	SIGNED	2	TRLOPN42	
	84	(54)	BITSTRING	1	TRLFLAGS42	JTB FLAG
			1... ....		TRLINJTB42	IN JTBL
			.111 1111		*	FREE
	85	(55)	CHARACTER	7	*	FREE

**Note:** Each record tracks an operation removed from the critical job table and still contained in the current plan.

### Log data record TRLB DY44

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	98	TRLBDY44	
52	(34)	CHARACTER	16	TRLADI44	APPLICATION ID
68	(44)	CHARACTER	10	TRLIA44	INPUT ARRIVAL
68	(44)	CHARACTER	6	TRLIAD44	
74	(4A)	CHARACTER	4	TRLIAT44	
78	(4E)	SIGNED	2	TRLOPN044	OPERATION NUMBER
80	(50)	SIGNED	2	TRLCID44	CONDITION ID
82	(52)	SIGNED	2	TRL44PREDOP	PREDECESSOR OPERATION NUM.
84	(54)	CHARACTER	16	TRL44PREDAD	PREDECESSOR APPLICATION ID
100	(64)	CHARACTER	10	TRL44PREDIA	PREDECESSOR INPUT ARRIVAL
110	(6E)	CHARACTER	1	TRL44PREDDEP	INTERNAL OR EXTERNAL
111	(6F)	CHARACTER	2	TRL44PREDTYP	RC OR ST
113	(71)	CHARACTER	2	TRL44PREDLOG	GE, GT, LE, LT, EQ, NE, RG
115	(73)	CHARACTER	4	TRL44PREDVALRC	RC VALUE
119	(77)	CHARACTER	4	TRL44PREDVALRC2	RC2 VALUE
123	(7B)	CHARACTER	1	TRL44PREDVALST	STATUS VALUE
124	(7C)	CHARACTER	1	TRLOLDST44	OLD CONDITION DEP. STATUS
125	(7D)	CHARACTER	1	TRLNEWST44	NEW CONDITION DEP. STATUS
126	(7E)	CHARACTER	2	CALLER: MC OR EM	
128	(80)	CHARACTER	8	TRLSTEPN44	STEP NAME
136	(88)	CHARACTER	8	TRLPROCS44	PROC NAME
144	(90)	CHARACTER	6	*	FREE

**Note:** This record is mainly intended to track a condition dependency status change after a MCP request. In this case the TRLCALLER44 field is set to MC. The GS task actually triggers the process. Other tasks might automatically trigger the process in particular cases (depending also on the AUDITCP initialization statement). In this case the TRLCALLER44 field is set to EM.



## Log data record TRLBODY45

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	42	TRLBODY45	
52	(34)	CHARACTER	16	TRLADI45	ADID
68	(44)	CHARACTER	10	TRLIA45	IA
68	(44)	CHARACTER	6	TRLIAD45	
74	(4A)	CHARACTER	4	TRLIAT45	
78	(4E)	SIGNED	2	TRLOPNO45	OPNUM
80	(50)	SIGNED	2	TRLCID45	COND ID
82	(52)	CHARACTER	1	TRLOLDST45	OLD STATUS
83	(53)	CHARACTER	1	TRLNEWST45	NEW STATUS
84	(54)	CHARACTER	2	TRLCALLER45	CALLER: MC OR EM
86	(56)	CHARACTER	8	*	FREE

**Note:** This record is mainly intended to track a condition status change after a MCP request. In this case the TRLCALLER45 field is set to MC. The GS task actually triggers the process. Other tasks might automatically trigger the process in particular cases (depending also on the AUDITCP initialization statement). In this case the TRLCALLER45 field is set to EM.

## Log data record TRLBODY46

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	*	TRLBODY46	BODY OF AD COND TABLE EVENT
52	(34)	CHARACTER	*	TRLCND46	MAPPED BY DCLCONRC

Each record tracks a condition dependency table for the automatic resolution of conditional successors. The record is mapped by the following tables, included in the data area DCLCONRC:

Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	*	CNDLREC	
0	(0)	CHARACTER	12	CNDLRECCOM	
0	(0)	CHARACTER	4	CNDLRECEYE	ALWAYS SET TO CNDR
4	(4)	SIGNED	4	CNDLRECFCOFF	
8	(8)	SIGNED	4	CNDLRECENTRIES	
12	(C)	CHARACTER	*	CNDLRECVAR	

Offsets	Type	Length	Name	
0	(0)	STRUCTURE	28	CNDLRECCOND
0	(0)	CHARACTER	20	CNDLREC_CONDKEY
0	(0)	CHARACTER	16	CNDLREC_ADID
16	(10)	SIGNED	2	CNDLRECT_OPR
18	(12)	SIGNED	2	CNDLREC_CID
20	(14)	SIGNED	4	CNDLREC_NCOFF
24	(18)	SIGNED	2	CNDLREC_SIMPNO
26	(1A)	CHARACTER	2	*
28	(1C)	CHARACTER		CNDLREC_END

Offsets	Type	Length	Name	
0	(0)	STRUCTURE	48	CNDLRECPREDS(*)
0	(0)	CHARACTER	18	CNDLRECPREDKEY
0	(0)	CHARACTER	16	CNDLRECPREDAID
16	(10)	SIGNED	2	CNDLRECPREDOPR
18	(12)	BITSTRING	1	CNDLRECPREDFLG
		1... ..		CNDLRECPREDINT
		.111 1111		*
19	(13)	CHARACTER	1	CNDLRECPREDST
20	(14)	CHARACTER	2	CNDLRECPREDTYPE
22	(16)	CHARACTER	2	CNDLRECPREDLOG
24	(18)	CHARACTER	4	CNDLRECPREDRC
28	(1C)	CHARACTER	4	CNDLRECPREDRC2
32	(20)	CHARACTER	8	CNDLRECSTEP
40	(28)	CHARACTER	8	CNDLRECPSTEP

## TRL - Job-tracking and audit record

### Log data record TRLB DY47

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	98	TRLB DY47	MISSING EVENT
52	(34)	CHARACTER	16	TRLADI47	ADID
68	(44)	CHARACTER	10	TRLIA47	IA
68	(44)	CHARACTER	6	TRLIAD47	DATE
74	(4A)	CHARACTER	4	TRLIAT47	TIME
78	(4E)	SIGNED	2	TRLOPNO47	OPNUM
80	(50)	SIGNED	2	TRLCID47	COND ID
82	(52)	SIGNED	2	TRL47PREDOP	PRED OPNO
84	(54)	CHARACTER	16	TRL47PREDAD	PRED ADID
100	(64)	CHARACTER	10	TRL47PREDIA	PRED IA
110	(6E)	CHARACTER	1	TRL47PREDDEP	INTERNAL OR EXTERNAL
111	(6F)	CHARACTER	2	TRL47PREDTYP	RC OR ST
113	(71)	CHARACTER	2	TRL47PREDLOG	LT,LE,GE,GT ...
115	(73)	CHARACTER	4	TRL47PREDVALRC	RC VALUE
119	(77)	CHARACTER	4	TRL47PREDVALRC2	RC2 VALUE
123	(7B)	CHARACTER	1	TRL47PREDVALST	STATUS VALUE
124	(7C)	CHARACTER	2	TRLCALLER47	CALLER: MC OR EM
126	(7E)	CHARACTER	8	TRLSTEPN47	STEP NAME
134	(86)	CHARACTER	8	TRLPROCS47	PROC STEP
142	(8E)	CHARACTER	1	TRLMISS47	MISSING EVENT
143	(8F)	CHARACTER	7	*	FREE

**Note:** Each record tracks a missing step-end event in the condition evaluation event.

### Log data record TRLB DY48

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	40	TRLB DY48	
52	(34)	CHARACTER	16	TRLADI48	
68	(44)	CHARACTER	10	TRLIA48	
68	(44)	CHARACTER	6	TRLIAD48	
74	(4A)	CHARACTER	4	TRLIAT48	
78	(4E)	CHARACTER	6	TRLOID48	
78	(4E)	CHARACTER	4	TRLWSN48	
82	(52)	SIGNED	2	TRLOPN48	
84	(54)	CHARACTER	3	TRLCALLER48	
87	(57)	CHARACTER	5	*	

**Note:** Each record tracks a recovered by condition event, for monitoring purposes only.

### Log data record TRLB DY49

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	102	TRLB DY49	Missing event
52	(34)	CHARACTER	16	TRLADI49	Application Name
68	(44)	CHARACTER	10	TRLIA49	Input Arrival Date and Time
68	(44)	CHARACTER	6	TRLIAD49	Input Arrival Date
74	(4A)	CHARACTER	4	TRLIAT49	Input Arrival Time
78	(4E)	SIGNED	2	TRLOPNO49	Operation number
80	(50)	SIGNED	2	TRLCID49	Condition Id
82	(52)	SIGNED	2	TRL49PREDOP	Condition Dep. Predecessor Op.Number
84	(54)	CHARACTER	16	TRL49PREDAD	Condition Dep. Predecessor Application Name
100	(64)	CHARACTER	10	TRL49PREDIA	Condition Dep. Predecessor Input Arrival
110	(6E)	CHARACTER	1	TRL49PREDDEP	Condition Dep. Type (internal/external)
111	(6F)	CHARACTER	2	TRL49PREDTYP	Condition Dep. Check Type (RC or ST)
113	(71)	CHARACTER	2	TRL49PREDLOG	Condition Dep. Check (LT, GT, LE, GE ...)
115	(73)	CHARACTER	4	TRL49PREDVALRC	Condition Dep. Value RC
119	(77)	CHARACTER	4	TRL49PREDVALRC2	Condition Dep. Value RC2
123	(7B)	CHARACTER	1	TRL49PREDVALST	Condition Dep. Value ST
124	(7C)	CHARACTER	2	TRLCALLER49	Caller: MC, EM
126	(7E)	CHARACTER	8	TRLSTEPN49	Condition Step Name

134	(86)	CHARACTER	8	TRLPROCS49	Condition Procedure Step name
142	(8E)	CHARACTER	1	TRLMISSN049	MissNo flag Y / N
143	(8F)	CHARACTER	8	TRLJOBNM49	Job name
151	(97)	CHARACTER	3	*	free

**Note:** Each record tracks a match between a step-end event and a condition dependency in the plan, for monitoring purposes only.

### Log data record TRLB DY50

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	73	TRLB DY50	Unexpected RC occurred
52	(34)	CHARACTER	16	TRLADI50	Application Name
68	(44)	CHARACTER	10	TRLIA50	Input Arrival Date and Time
68	(44)	CHARACTER	6	TRLIAD50	Input Arrival Date
74	(4A)	CHARACTER	4	TRLIAT50	Input Arrival Time
78	(4E)	CHARACTER	6	TRLOID50	Operation Id
78	(4E)	CHARACTER	4	TRLWSN50	Workstation name
82	(52)	SIGNED	2	TRLOPN50	Operation Number
84	(54)	CHARACTER	3	TRLCALLER50	Caller
87	(57)	CHARACTER	1	TRLTYPE50	Y or N
88	(58)	CHARACTER	8	TRLJOBNAME50	Jobname
96	(60)	CHARACTER	8	TRLJOBID50	Job Id
104	(68)	CHARACTER	8	TRLSTEP50	Condition Step Name
112	(70)	CHARACTER	8	TRLPSTEP50	Condition Procedure Step name
120	(78)	CHARACTER	1	TRLSTEPEND50	Step End event Y / N
121	(79)	CHARACTER	1	TRLSTATUS50	Operation Status
122	(7A)	CHARACTER	3	*	free

**Note:** Each record tracks an Unexpected RC situation due to a job or a step-end result, for monitoring purposes only.

### Log data record TRLB DY51

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	*	TRLB DY51A	Joblib jcl log record
52	(34)	CHARACTER	76	TRLB DY51	Record data
52	(34)	UNSIGNED	4	TRLKLN51	Size of key
56	(38)	UNSIGNED	4	TRLREC51	Amount of data this re
60	(3C)	CHARACTER	4	TRLFIL51	Logical file name
64	(40)	CHARACTER	1	TRLACC51	Access type (R, U, I, D)
65	(41)	BITSTRING	3	TRLRSV51	Filler
68	(44)	CHARACTER	52	TRLKEY51	Job library
68	(44)	CHARACTER	44	TRLLIB51	Job library
112	(70)	CHARACTER	8	TRLMEM51	Jcl member
120	(78)	CHARACTER	8	*	Reserved
128	(80)	CHARACTER	*	TRLDAT51	Record data

**Note:** Each record tracks an Unexpected RC situation due to a job or a step-end result, for monitoring purposes only.

### Log data record TRLB DY52

Offsets	Type	Length	Name	Description	
52	(34)	STRUCTURE	*	TRLB DY52	
52	(34)	SIGNED	4	TRL SIZE52	XD02LEN
56	(38)	CHARACTER	*	TRLDATA52	XD02 RECORD
Offsets	Type	Length	Name	Description	
0	(0)	STRUCTURE	12	TRLWRK	
0	(0)	ADDRESS	4	TRLWRKNXT	
4	(4)	CHARACTER	2	TRLWRKTYP	
6	(6)	CHARACTER	2	*	
8	(8)	ADDRESS	4	TRLWRKELP	

## TRL - Job-tracking and audit record

Offsets	Type	Length	Name	Description
0	(0) STRUCTURE	12	TRLMCP	
0	(0) ADDRESS	4	TRLMCPNXT	
4	(4) CHARACTER	2	TRLMCPPTYP	
6	(6) CHARACTER	2	*	
8	(8) ADDRESS	4	TRLMCPPELP	

**Note:** Each record tracks an Unexpected RC situation due to a job or a step-end result, for monitoring purposes only.

## Cross reference

NAME	HEX OFFSET	HEX VALUE	LEVEL
TRL#OPDL28	5C		2
TRL#OPDU28	5E		2
TRL#OP28	60		2
TRLACC32	44		2
TRLACC51	40		3
TRLACT34	66		2
TRLADI23	34		2
TRLADI34	4C		2
TRLADI40	34		2
TRLADI42	34		2
TRLADI44	34		2
TRLADI45	34		2
TRLADI47	34		2
TRLADI48	34		2
TRLADI49	34		2
TRLADI50	34		2
TRLADLD27	68		3
TRLADLD28	54		3
TRLADLT27	6E		3
TRLADLT28	56		3
TRLADL27	68		2
TRLADL28	54		2
TRLADU27	58		2
TRLADU28	6C		3
TRLAID25	34		2
TRLAID26	34		2
TRLAID27	34		2
TRLAID28	34		2
TRLAID33	34		2
TRLAID38	34		2
TRLAID41	34		2
TRLALTWS25	80		2
TRLARINFO	50		2
TRLARPSTEP	5C		3
TRLARSTEP	54		3
TRLARSTN	50		3
TRLBW	2		3
TRLBDY20	34		1
TRLBDY23	34		1
TRLBDY24	34		1
TRLBDY25	34		1
TRLBDY26	34		1
TRLBDY27	34		1
TRLBDY28	34		1
TRLBDY29	34		1
TRLBDY30	34		1
TRLBDY31	34		1
TRLBDY32	34		1
TRLBDY33	34		1
TRLBDY34	34		1
TRLBDY35	34		1

## TRL - Job-tracking and audit record

TRLBDY36	34		1
TRLBDY37	34		1
TRLBDY38	34		1
TRLBDY39	34		1
TRLBDY40	34		1
TRLBDY41	34		1
TRLBDY42	34		1
TRLBDY44	34		1
TRLBDY45	34		1
TRLBDY46	34		1
TRLBDY47	34		1
TRLBDY48	34		1
TRLBDY49	34		1
TRLBDY50	34		1
TRLBDY51	34		2
TRLBDY51A	34		1
TRLBDY52	34		1
TRLBYP23	5F	40	3
TRLCALLER44	7E		2
TRLCALLER45	54		2
TRLCALLER47	7C		2
TRLCALLER48	54		2
TRLCALLER49	7C		2
TRLCALLER50	54		2
TRLCAT34	A3		2
TRLCHG30	36	40	3
TRLCHG32	74		3
TRLCID44	50		2
TRLCID45	50		2
TRLCID47	50		2
TRLCID49	50		2
TRLCKPTR	30	80	4
TRLCND46	34		2
TRLCNT35	44		3
TRLCOM	0		2
TRLCPCHGD40	5D	80	3
TRLCPDD36	34		2
TRLCPEUT	14		5
TRLCPKEY	14		3
TRLCYC#30	40		3
TRLCYC#35	54		3
TRLCYC#39	4C		3
TRLDATA37	3C		2
TRLDATA52	38		2
TRLDAT32	88		2
TRLDAT51	80		2
TRLDDN25	56		2
TRLDDN34	6F		2
TRLDPA35	36	80	3
TRLDPA39	34	80	3
TRLDSN34	77		2
TRLDURS23	78		2
TRLDUR23	55		2
TRLEDLD27	62		3
TRLEDLT27	64		3
TRLEDL27	62		2
TRLEDU27	54		2
TRLERC23	5B		2
TRLETC31	36		2
TRLEV DAT	C		3
TRLEVTIM	10		3
TRLEVT23	54		2
TRLEXR29	35		2
TRLEXSR30	48		2
TRLEXS30	38		1
TRLFDB23	5F	80	3
TRLFILL	27		3

## TRL - Job-tracking and audit record

	TRLFILL2	30		3
	TRLFIL32	40		2
	TRLFIL51	3C		3
	TRLFIRST	27	80	4
	TRFLAG	6E		2
	TRFLAGS42	54		2
	TRFLAG40	5D		2
	TRFLA30	36		2
	TRFL135	36		2
	TRFL139	34		2
	TRLGMT0F	2C		3
	TRLIAD23	44		2
	TRLIAD25	44		3
	TRLIAD27	44		2
	TRLIAD28	44		2
	TRLIAD33	44		3
	TRLIAD40	44		3
	TRLIAD42	44		3
	TRLIAD44	44		3
	TRLIAD45	44		3
	TRLIAD47	44		3
	TRLIAD48	44		3
	TRLIAD49	44		3
	TRLIAD50	44		3
	TRLIAT23	4A		2
	TRLIAT25	4A		3
	TRLIAT27	4A		2
	TRLIAT28	4A		2
	TRLIAT33	4A		3
	TRLIAT34	5C		2
	TRLIAT40	4A		3
	TRLIAT42	4A		3
	TRLIAT44	4A		3
	TRLIAT45	4A		3
	TRLIAT47	4A		3
	TRLIAT48	4A		3
	TRLIAT49	4A		3
	TRLIAT50	4A		3
	TRLIA25	44		2
	TRLIA26	44		2
	TRLIA33	44		2
	TRLIA38	44		2
	TRLIA40	44		2
	TRLIA41	44		2
	TRLIA42	44		2
	TRLIA44	44		2
	TRLIA45	44		2
	TRLIA47	44		2
	TRLIA48	44		2
	TRLIA49	44		2
	TRLIA50	44		2
	TRLINJTB42	54	80	3
	TRLJBN23	70		2
	TRLJID25	4E		2
	TRLJID34	3C		2
	TRLJNM25	5E		2
	TRLJNM34	34		2
	TRLJOBID50	60		2
	TRLJOBNAME50	58		2
	TRLJOBNM47	8F		2
	TRLJOBNM49	8F		2
	TRLJRNFL	27	01	4
	TRLJRPFL	27	04	4
	TRLJTDD36	3C		2
	TRLKEY32	48		2
	TRLKEY51	44		3
	TRLKLN32	34		2

## TRL - Job-tracking and audit record

	TRLKLN51	34		3
	TRLLAST	27	40	4
	TRLLENGT	28		3
	TRLLIB32	64		3
	TRLLIB51	44		4
	TRLLIM35	48		3
	TRLLIM39	40		3
	TRLLOGID	7		3
	TRLMAN23	5F	20	3
	TRLMCP	0		1
	TRLMCPPELP	8		2
	TRLMCPNXT	0		2
	TRLMCPTYP	4		2
	TRLMCP35	48		2
	TRLMCP39	40		2
	TRLMEM32	6C		3
	TRLMEM51	70		4
	TRLMISSN049	8E		2
	TRLMISS47	8E		2
	TRLMJS35	40		2
	TRLMOD20	34		2
	TRMSG33	4E		2
	TRLMT024	34		2
	TRLNAM33	4F		2
	TRLNEWST44	7D		2
	TRLNEWST45	53		2
	TRLNODE30	38		2
	TRLNODE35	4C		2
	TRLNODE39	44		2
	TRLNOD34	44		2
	TRLODL28	4E		3
	TRLODLT28	50		3
	TRLODL28	4E		2
	TRLODU28	68		3
	TRLOID23	4E		2
	TRLOID27	4E		2
	TRLOID40	4E		2
	TRLOID42	4E		2
	TRLOID48	4E		2
	TRLOID50	4E		2
	TRLOLDCP	27	02	4
	TRLOLDST44	7C		2
	TRLOLDST45	52		2
	TRLOPADLD28	76		4
	TRLOPADLT28	78		4
	TRLOPADL28	76		3
	TRLOPC	4		3
	TRLOPI28	62		3
	TRLOPN044	4E		2
	TRLOPN045	4E		2
	TRLOPN047	4E		2
	TRLOPN049	4E		2
	TRLOPN23	52		3
	TRLOPN40	52		3
	TRLOPN42	52		3
	TRLOPN48	52		3
	TRLOPN50	52		3
	TRLOPODL28	70		4
	TRLOPODLT28	72		4
	TRLOPODL28	70		3
	TRLOPS28	62		2
	TRLOPT35	40		3
	TRLORIG27	5F		2
	TRLOWI23	60		2
	TRLPOS30	40		2
	TRLPOS35	54		2
	TRLPOS39	4C		2

## TRL - Job-tracking and audit record

	TRLPROCS44	88		2
	TRLPROCS47	86		2
I	TRLPROCS49	86		2
I	TRLPSTEP50	70		2
	TRLRCBDY	34		2
	TRLRCTYP	9		3
	TRLRCVER	B		3
	TRLRDRN30	3C		2
	TRLRDRN35	50		2
	TRLRDRN39	48		2
	TRLREADY23	7C		2
	TRLREC	0		1
	TRLREC#30	44		3
	TRLREC#35	58		3
	TRLREC#39	50		3
	TRLREC32	36		2
	TRLREC40	5E		2
	TRLREC40D	5E		3
	TRLREC40T	64		3
I	TRLREC51	38		3
	TRLREM32	3C		2
	TRLREQ30	35		2
	TRLREQ31	35		2
	TRLRER25	6E	40	3
	TRLRESUB	27	08	4
	TRLRES27	5E		2
	TRLRES35	34		2
	TRLRID27	60		2
	TRLRID28	5A		2
	TRLRNREC40	58		2
	TRLRSR30	38		2
	TRLRSV32	45		2
I	TRLRSV51	41		3
	TRLSA	30	40	4
	TRLSEQN40	54		2
	TRLSIZE	0		3
	TRLSIZE37	38		2
I	TRLSIZE52	34		2
	TRLSRS30	36	80	3
	TRLSSEQ#	22		4
I	TRLSTATUS50	79		2
	TRLSTC	27	20	4
I	TRLSTEPEND50	78		2
	TRLSTEPN44	80		2
	TRLSTEPN47	7E		2
I	TRLSTEPN49	7E		2
I	TRLSTEP50	68		2
	TRLSTP34	67		2
	TRLSUBTOKEN25	78		2
	TRLTOK_FULLL25	70		2
	TRLTOK_PRE25	70		3
	TRLTOK25	74		3
	TRLTOT32	38		2
	TRLTOT35	4A		3
	TRLTOT39	42		3
	TRLTRG40	5C		2
	TRLTYPE40	68		2
I	TRLTYPE50	57		2
	TRLTYP29	34		2
	TRLTYP30	34		2
	TRLTYP31	34		2
	TRLTYP37	34		2
	TRLTZOFF41	4E		2
	TRLUSER	1A		4
	TRLUSR25	66		2
	TRLUSR35	38		2
	TRLUSR39	38		2



## TRL - Job-tracking and audit record

TRLWASUJ	6E	80	3
TRLWRK	0		1
TRLWRKELP	8		2
TRLWRKNXT	0		2
TRLWRKTYP	4		2
TRLWSN23	4E		3
TRLWSN40	4E		3
TRLWSN42	4E		3
TRLWSN48	4E		3
TRLWSN50	4E		3
TRLWTO	27	10	4
TRLXST26	4E		2
TRLX23	5F	10	3
TRL44PREDAD	54		2
TRL44PREDEP	6E		2
TRL44PREDIA	64		2
TRL44PREDLOG	71		2
TRL44PREDOP	52		2
TRL44PREDTYP	6F		2
TRL44PREDVALRC	73		2
TRL44PREDVALRC2	77		2
TRL44PREDVALST	7B		2
TRL47PREDAD	54		2
TRL47PREDEP	6E		2
TRL47PREDIA	64		2
TRL47PREDLOG	71		2
TRL47PREDOP	52		2
TRL47PREDTYP	6F		2
TRL47PREDVALRC	73		2
TRL47PREDVALRC2	77		2
TRL47PREDVALST	7B		2
TRL49PREDAD	54		2
TRL49PREDEP	6E		2
TRL49PREDIA	64		2
TRL49PREDLOG	71		2
TRL49PREDOP	52		2
TRL49PREDTYP	6F		2
TRL49PREDVALRC	73		2
TRL49PREDVALRC2	77		2
TRL49PREDVALST	7B		2

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## WAP - Workstation analyzer parameters

Name : DCLWAP

Function:

This segment declares a workstation analyzer area. This control block is built, initialized, and freed by the workstation analyzer task.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	344	WAP	WS ANALYZER PARAMETERS
0	(0)	CHARACTER	4	WAPDESC	BLOCK DESCRIPTOR = WAP
4	(4)	CHARACTER	2	WAPVER	BLOCK MAPPING VERSION
6	(6)	BITSTRING	2	WAPFLAGS	FLAGS
				WAPNOWT	NO WAIT THIS TIME
				WAPSUBX	CALL SUBUS EXIT
				WAPUX01	UX02 RC NOT 0
				WAPSUBER	ERROR IN SUBMISSION OF A CENTRALIZED SCRIPT
				WAPSAERR	ERROR RETURNED FROM SA EXIT

## WAP - Workstation analyzer parameters

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
				WAPFAKESUB	FAKE SUBMISSION FOR PARALL
8	(8)	BITSTRING	4	WAPTMECB	TIMER ECB
12	(C)	ADDRESS	4	WAPMCAP	MCA ADDRESS
16	(10)	ADDRESS	4	WAPDOAP	DOA ADDRESS
20	(14)	ADDRESS	4	WAPJBUF	JOBLIB BUFFER ADDRESS
24	(18)	ADDRESS	4	WAPEMPP	EV MGR PARAMETER AREA
28	(1C)	ADDRESS	4	WAPOPRP	CURRENT OPER RECORD ADDR
32	(20)	ADDRESS	4	WAPJCLB	JCL RECORD BUFFER, < 16M
36	(24)	SIGNED	4	WAPJSIZE	MAXIMUM JS RECORD SIZE
40	(28)	ADDRESS	4	WAPSSRP	SR AREA TO SUBUS
44	(2C)	CHARACTER	8	WAPRUSER	CURRENT TSO USER
52	(34)	CHARACTER	16	WAPJID	JOB IDENTIFICATION
52	(34)	CHARACTER	8	WAPJNAM	JOB NAME
60	(3C)	CHARACTER	8	WAPJNUM	JES JOB NUMBER
68	(44)	CHARACTER	10	WAPLATE	NEXT TEST LATE OPER
78	(4E)	CHARACTER	10	WAPDWTO	NEXT DEADLINE WTO TIME
88	(58)	CHARACTER	1	WAPSSAT	VAR SUBSTITUTION STATUS
89	(59)	CHARACTER	3	*	RESERVED
92	(5C)	CHARACTER	88	WAPDCB	JOBLIB DCB
180	(B4)	CHARACTER	64	WAPEXIT	TIMER EXIT
244	(F4)	CHARACTER	10	WAPSYNC	NEXT TIME FOR NEW SYNC
254	(FE)	SIGNED	2	WAPPLOOP#	LOOP COUNTER
256	(100)	ADDRESS	4	WAPPDOAP	PREVIOUS DOA ADDRESS
260	(104)	CHARACTER	4	WAPPCPPTR	PREVIOUS CP INDEX
260	(104)	UNSIGNED	3	WAPOCCX	OCCURRENCE INDEX
263	(107)	UNSIGNED	1	WAPOPNO	OPERATION NUMBER
264	(108)	CHARACTER	4	WAPUX01CO	USER EXIT 02 RC
268	(10C)	CHARACTER	48	WAPPERFDB	PERF DEBUG INFO
268	(10C)	CHARACTER	8	WAPWASUB	WASUB ELAPSED TIME
276	(114)	CHARACTER	8	WAPJHGET	JHGET ELAPSED TIME
284	(11C)	CHARACTER	8	WAPJHPDS	JHPDS ELAPSED TIME
292	(124)	CHARACTER	8	WAPEXI02	EXI02 ELAPSED TIME
300	(12C)	CHARACTER	8	WAPJHPUT	JHPUT ELAPSED TIME
308	(134)	CHARACTER	8	WAPEXI01	EXI01 ELAPSED TIME
316	(13C)			WAPDEBUG	PERF DEBUG ON
				*	RESERVED
317	(13D)	CHARACTER	3	*	RESERVED
320	(140)	ADDRESS	4	WAPDIAP	ADDRESS OF ZZWSA
324	(144)	CHARACTER	20	*	RESERVED
340	(154)	CHARACTER	4	*	RESERVED
344	(158)	CHARACTER		WAPEND	END OF WAP

## Cross reference

Name	Hex Offset	Hex Value	Level
WAP	0		1
WAPDCB	5C		2
WAPDEBUG	13C	80	2
WAPDESC	0		2
WAPDIAP	140		2
WAPDOAP	10		2
WAPDWTO	4E		2

## WAP - Workstation analyzer parameters

Name	Hex Offset	Hex Value	Level
WAPEMPP	18		2
WAPEND	158		2
WAPEXIT	B4		2
WAPEXI01	134		3
WAPEXI02	124		3
WAPFAKESUB	6	04	3
WAPFLAGS	6		2
WAPJBUF	14		2
WAPJCLB	20		2
WAPJHGET	114		3
WAPJHPDS	11C		3
WAPJHPUT	12C		3
WAPJID	34		2
WAPJNAM	34		3
WAPJNUM	3C		3
WAPJSIZE	24		2
WAPLATE	44		2
WAPMCAP	C		2
WAPNOWT	6	80	3
WAPOCCX	104		3
WAPOPNO	107		3
WAPOPRP	1C		2
WAPPCPTR	104		2
WAPPDOAP	100		2
WAPPERFDB	10C		2
WAPPLOOP#	FE		2
WAPRUSER	2C		2
WAPSAERR	6	08	3
WAPSCHE	144		2
WAPSSRP	28		2
WAPSSSTAT	58		2
WAPSUBER	6	10	3
WAPSUBX	6	40	3
WAPSYNC	F4		2
WAPTMECB	8		2
WAPUX01	6	20	3
WAPUX01CO	108		2
WAPVER	4		2
WAPWASUX	10C		3

## WQA - Workstation queue area

### WQA - Workstation queue area

Name : DCLWQA

**Function:**

This segment declares a workstation queue area entry. WQAs are chained, via WQAWQANX, to the anchor in NMMWAQ1. WQAs are built by the NMM when the scheduler is started from information in current plan workstation records.

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
0	(0)	STRUCTURE	248	WQA	WORKSTATION QUEUE AREA	
0	(0)	CHARACTER	4	WQADESC	BLOCK DESCRIPTOR = 'WQA '	
4	(4)	CHARACTER	2	WQAVER	BLOCK MAPPING VERSION	
6	(6)	BITSTRING	1	WQAFLGS	WORKSTATION FLAGS	
				WQADEL	WQA IS LOGICALLY DELETED	
				WQAIVLNP	PS NOT USED	
				WQAR1C	CONTROL ON RESOURCE 1	
				WQAR2C	CONTROL ON RESOURCE 2	
				WQAREROUTE	1: REROUTE MODE	
				WQAWS_VARY	1: VARIED STATUS	
				WQARTR_PEND	1: RTR EVENT PENDING	
				WQAOFF_PEND	1: PENDING OFFLINE	
7	(7)	CHARACTER	1	WQAWSTYP	WORKSTATION TYPE	
8	(8)	CHARACTER	4	WQAWSNAM	WORKSTATION NAME	
12	(C)	CHARACTER	1	WQAWSREP	REPORTING ATTRIBUTE	
13	(D)	CHARACTER	1	WQAPREP	JOB PREPARATION WS Y N	
14	(E)	CHARACTER	1	WQASTATUS	WS STATUS	
15	(F)	BITSTRING	1	WQAFLAG2	WORKSTATION FLAG 2	
				WQASTC	STC OPTION	
				WQAWTO	WTO OPTION	
				WQASSEQ_PEND	WAITING FOR J0 EVENT	
				WQAOSI	USER DEFINED DESTINATION	
				WQATOKEN	TOKEN REQUIRED	
				WQAWSSTAT	STATUS BY WSSTAT	
				WQAUX009	STATUS BY EQQUX009	
				WQATCP	TCP DESTINATION	
16	(10)	UNSIGNED	2	WQACURR1	AMOUNT OF R1 IN USE	
18	(12)	UNSIGNED	2	WQACURR2	AMOUNT OF R2 IN USE	
20	(14)	SIGNED	4	WQAMAX15	MAX NO OF EVENTS IN 15 MIN	
24	(18)	BITSTRING	2	WQAFLAG3	WORKSTATION FLAG 3	
				WQAAPPC	APPC DESTINATION	
				WQAWAIT	WAIT WORKSTATION	
				WQAZNOINFO	ZCENTRIC INIT STATUS	
				WQASTCHG	WQA STATUS CHANGE	
24	(18)	BITSTRING	1	*	FREE	
26	(1A)	BITSTRING	2	*	FREE	
				WQATCPNEW	TCPIP CLASSIC TRACKER	
28	(1C)	ADDRESS	4			
32	(20)	ADDRESS	4	WQADOAP	ADDR OF 1ST ACTIVE OPER	
36	(24)	ADDRESS	4	WQASUREP	ADDR OF SU/RE DS IOC	
40	(28)	ADDRESS	4	WQAOINTP	CURR INTERVAL IVL	
44	(2C)	ADDRESS	4	WQA_ALTWSP	ADDR OF ALTERNATE	
48	(30)	ADDRESS	4	WQADOAPR	ADDR OF 1ST READY OPER	
52	(34)	CHARACTER	12	WQASUMC	SUM OF COMPLETED OPS	

## WQA - Workstation queue area

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
	52	(34)	SIGNED	4	WQASUMC#	NUMBER
	56	(38)	SIGNED	4	WQASUMCE	ESTIMATED DURATION
	60	(3C)	SIGNED	4	WQASUMCR	REAL DURATION
	64	(40)	CHARACTER	12	WQASUMI	SUM OF INTERRUPTED OPS
	64	(40)	SIGNED	4	WQASUMI#	NUMBER
	68	(44)	SIGNED	4	WQASUMIE	ESTIMATED DURATION
	72	(48)	SIGNED	4	WQASUMIR	REAL DURATION
	76	(4C)	CHARACTER	8	WQASUMS	SUM OF STARTED OPS
	76	(4C)	SIGNED	4	WQASUMS#	NUMBER
	80	(50)	CHARACTER	8	WQASUMSE	ESTIMATED DURATION
	84	(54)	CHARACTER	8	WQASUMR	SUM OF READY OPS
	84	(54)	SIGNED	4	WQASUMR#	NUMBER
	88	(58)	CHARACTER	8	WQASUMRE	ESTIMATED DURATION
	92	(5C)	CHARACTER	8	WQASUMW	SUM OF WAITING OPS
	92	(5C)	SIGNED	4	WQASUMW#	NUMBER
	96	(60)	SIGNED	4	WQASUMWE	ESTIMATED DURATION
	100	(64)	SIGNED	4	WQASUMA	SUM OF ARRIVING OPS
	104	(68)	SIGNED	4	WQASUMNRR	SUM OF '*' READY
	108	(6C)	SIGNED	4	WQASUMU	SUM OF UNDECIDED
	112	(70)	SIGNED	4	WQASUME	SUM OF ERROR OPERS
	116	(74)	SIGNED	4	WQASUML	SUM OF LATE OPERS
	120	(78)	CHARACTER	8	WQACREVT	LAST SYNCHRONOUS EVENT CREATION TIME
	120	(78)	SIGNED	4	WQADATE	DATE FORMAT (00YYDDDF)
	124	(7C)	SIGNED	4	WQATIME	TIME FORMAT (SECS*100)
	128	(80)	ADDRESS	4	WQAVIRTPTR	IF WQAVTYPE: N ==> 0, V ==> 1° VIRT DEST WQA, D ==> OWNING VIRT WQA
	132	(84)	SIGNED	4	WQASUMX	SUM OF DUMMY COMPL OPERATIONS
	136	(88)	SIGNED	4	WQASUMD	SUM OF DELETED OPERATIONS
	140	(8C)	CHARACTER	8	WQAPREEV	TIME OF PREVIOUS EVENT
	140	(8C)	CHARACTER	4	WQAPREDT	DATE (FORMAT 00YYDDDF)
	144	(90)	CHARACTER	4	WQAPRETM	TIME (FORMAT HHMMSSSTH)
	148	(94)	CHARACTER	8	WQAOFF	TIME OF OFFLINE EVENT
	148	(94)	CHARACTER	4	WQAOFF_DATE	DATE (FORMAT 00YYDDDF)
	152	(98)	CHARACTER	4	WQAOFF_TIME	TIME (FORMAT HHMMSSSTH)
	156	(9C)	CHARACTER	2	WQAWSR1N	NAME OF R1 ON THIS WORKSTATION
	158	(9E)	CHARACTER	2	WQAWSR2N	NAME OF R2 ON THIS WORKSTATION
	160	(A0)	CHARACTER	8	WQASUDS	SUBMIT DESTINATION
	168	(A8)	SIGNED	4	WQAIVL#	NUMBER OF OPEN INTERVALS
	172	(AC)	CHARACTER	32	WQASDESC	WORKSTATION DESCRIPTION
	204	(CC)	CHARACTER	1	WQAEOPTP	POINTER TO E2E OPTIONS
	208	(D0)	CHARACTE	1	WQAVTYPE	
	209	(D1)	UNSIGNED	1	WQARSEQ#	CURRENT SUBMIT REQ#
	210	(D2)	UNSIGNED	2	WQASSEQ#	CURRENT SUBMIT SEQ#
	212	(D4)	CHARACTER	8	WQANETID	APPC ROUTE NETID
	220	(DC)	CHARACTER	8	WQANETLU	APPC ROUTE LU NAME
	228	(E4)	UNSIGNED	1	WQASUMCES	SECONDS FOR WQASUMCE
	229	(E5)	UNSIGNED	1	WQASUMCRS	SECONDS FOR WQASUMCR
	230	(E6)	UNSIGNED	1	WQASUMIES	SECONDS FOR WQASUMIE
	231	(E7)	UNSIGNED	1	WQASUMIRS	SECONDS FOR WQASUMIR

## WQA - Workstation queue area

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
232	(E8)	UNSIGNED	1	WQASUMSES	SECONDS FOR WQASUMSE
233	(E9)	UNSIGNED	1	WQASUMRES	SECONDS FOR WQASUMRE
234	(EA)	UNSIGNED	1	WQASUMWES	SECONDS FOR WQASUMWE
235	(EB)	CHARACTER	1	WQATWS	TIVOLI WORKLOAD SCHEDULER WORKSTATION
236	(EC)	CHARACTER	1	WQALNKSTA	TIVOLI WORKLOAD SCHEDULER WORKSTATION LINK STATUS
237	(ED)	CHARACTER	1	WQAFGLTWS	TIVOLI WORKLOAD SCHEDULER WORKSTATION SPECIFIC FLAGS
		1... ..		WQALNKVA	TIVOLI WORKLOAD SCHEDULER LINKED MAN VARIED
		.1.. ..		WQASTAVA	TIVOLI WORKLOAD SCHEDULER STATUS MAN VARIED
		..1. ....		WQALNKDW	TIVOLI WORKLOAD SCHEDULER LINKED DOWN TO CPU
		...1 ....		WQAWRTST	TIVOLI WORKLOAD SCHEDULER WRITER STATUS FOR CPU
		.... 1..		WQACMDLNK	TIVOLI WORKLOAD SCHEDULER command link:
					on=link off=unlink
		.... .1..		WQACMDSTA	TIVOLI WORKLOAD SCHEDULER command status:
					on=start off=stop
		.... ..1.		WQAFULLNK	TIVOLI WORKLOAD FULLY LINKED STATUS:
					ON=FULLY LINKED OFF=NOT FULLY LINKED
238	(EE)	UNSIGNED	2	WQACPULIMIT	CPU LIMIT VALUE
240	(F0)	CHARACTER	1	WQAWSFLG	WORKSTATION FLAG
		1... ..		WQASAUTO	WORKSTATION SYSTEM AUTOMATION STATUS:
					YES=ENABLED NO=DISABLED
		.1.. ....		WQASTARTV	ON: LAST PROPOSED VIRT
		..1. ....		WQASUBV	ON: LAST SUB FOR VIRT
		...1 ....		WQAZCAGENT	ON: Z CENTRIC DISTRIBUTED AGENT
		.... 1..		WQAPARALWS	ON: PARALLEL WORKSTATION
		.... .1..		WQADYN	ON: DYNAMIC WORKSTATION
		.... ..1.		*	AVAILABLE
241	(F1)	CHARACTER	1	WQAFULLYACT	Y/N
242	(F2)	CHARACTER	1	WQARENGT	REMOTE ENGINE TYPE
243	(F3)	CHARACTER	1	*	FREE
244	(F4)	SIGNED	4	WQASUMH	SUM OF MAN HOLD OPERATIONS
248	(F8)	CHARACTER		WQAEND	END OF WQA

## Cross reference

Name	Hex Offset	Hex Value	Level
WQA	0		1
WQA_ALTWSP	2C		2
WQAACCOMP	CC		2
WQAAPPC	18	80	3
WQACMDLNK	ED	08	3
WQACMDSTA	ED	04	3
WQACPULIMIT	EE		2
WQACREVT	78		2
WQACURR1	10		2
WQACURR2	12		2
WQADATE	78		3
WQADEL	6	80	3
WQADESC	0		2
WQADOAP	20		2
WQADOAPR	30		2
WQADYN	F0	04	3
WQAEND	F8		2
WQAEOPTP	CC		2
WQAFLAG2	F		2
WQAFLAG3	18		2
WQAFLGS	6		2
WQAFLGTWS	ED		2
WQAFULLNK	ED	02	3
WQAFULLYACT	F1		2
WQAIVL#	A8		2
WQAIVLNP	6	40	3
WQALNKDW	ED	20	3
WQALNKSTA	EC		2
WQALNKVA	ED	80	3
WQAMAX15	14		2
WQANETID	D4		2
WQANETLU	DC		2
WQAOFF	94		2
WQAOFF_DATE	94		3
WQAOFF_PEND	6	01	3
WQAOFF_TIME	98		3
WQAOINTP	28		2
WQAOSI	F	10	3
WQAPARALWS	F0	08	3
WQAPREDT	8C		3
WQAPREEV	8C		2
WQAPREP	D		2
WQAPRETM	90		3
WQARENGT	F2		2
WQARERROUTE	6	08	3
WQARSEQ#	D1		2
WQARTR_PEND	6	02	3
WQAR1C	6	20	3
WQAR2C	6	10	3

## WQA - Workstation queue area

Name	Hex Offset	Hex Value	Level
WQASAUTO	F0	80	3
WQASDESC	AC		3
WQASSEQ_PEND	F	20	3
WQASSEQ#	D2		2
WQASTARTV	F0	40	3
WQASTATUS	E		2
WQASTAVA	ED	40	3
WQASTC	F	80	3
WQASTCHG	18	10	3
WQASUBV	F0	20	3
WQASUDS	A0		2
WQASUMA	64		2
WQASUMC	34		2
WQASUMC#	34		3
WQASUMCE	38		3
WQASUMCES	E4		2
WQASUMCR	3C		3
WQASUMCRS	E5		2
WQASUMD	88		2
WQASUME	70		2
WQASUMH	F4		2
WQASUMI	40		2
WQASUMI#	40		3
WQASUMIE	44		3
WQASUMIES	E6		2
WQASUMIR	48		3
WQASUMIRS	E7		2
WQASUML	74		2
WQASUMNRR	68		2
WQASUMR	54		2
WQASUMR#	54		3
WQASUMRE	58		3
WQASUMRES	E9		2
WQASUMS	4C		2
WQASUMS#	4C		3
WQASUMSE	50		3
WQASUMSES	E8		2
WQASUMU	6C		2
WQASUMW	5C		2
WQASUMW#	5C		3
WQASUMWE	60		3
WQASUMWES	EA		2
WQASUMX	84		2
WQASUREP	24		2
WQATCP	F	01	3
WQATCPNEW	1A	80	3
WQATIME	7C		3
WQATOKEN	F	08	3
WQATWS	EB		2
WQAUX009	F	02	3
WQAVR	4		2



## WQA - Workstation queue area

Name	Hex Offset	Hex Value	Level
WQAVIRTPTR	80		2
WQAVTYPE	D0		2
WQAWAIT	18	40	3
WQAWQANX	1C		2
WQAWRTST	ED	10	3
WQAWS_VARY	6	04	3
WQAWSFLG	F0		2
WQAWSNAM	8		2
WQAWSREP	C		2
WQAWSR1N	9C		2
WQAWSR2N	9E		2
WQAWSSTAT	F	04	3
WQAWSTYP	7		2
WQAWTO	F	40	3
WQAZCAGENT	F0	10	3
WQASUBV	18	20	3

## WSD - Workstation description record

Name : DCLWSD

Function:

This segment declares a workstation definition, physically located in the workstation description database (EQQWSDS) The WSD structure is as follows:

- 1 WSD
- 2 common data
- 2 a table with one row per day defined describing the day
- 2 a table with one row per open time interval describing the interval

Each entry in the day table contains an index into the interval table for the first interval defined for that particular day.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	*	WSD	
0	(0)	CHARACTER	140	WSDCOMMON	
0	(0)	CHARACTER	6	*	RESERVED FOR VSAM
6	(6)	CHARACTER	4	WSDKEY	*** KEY FIELD *****
6	(6)	CHARACTER	4	WSDNAME	WS NAME
10	(A)	CHARACTER	4	WSDEYE	EYECATCHER
14	(E)	UNSIGNED	1	WSDVERS	VERSION NUMBER
15	(F)	CHARACTER	4	WSDTRSPT	TIME FROM PRE WS HHMM
19	(13)	CHARACTER	4	WSDOPDUR	OPER DURATION DEFAULT HHMM
23	(17)	CHARACTER	8	WSDROUT	PRINTOUT ROUTING FOR DP
31	(1F)	CHARACTER	32	WSDDESCR	WS DESCRIPTION
63	(3F)	CHARACTER	1	WSDTYPE	TYPE OF WORKSTATION
64	(40)	BITSTRING	1	WSDFLG	
				WSDPREP	JOBSETUP USED ON THIS WS?
				WSDPSJT	CONTROL ON SERVERS
				WSDSPLIT	SPLITTABLE ATTRIBUTE
				WSDSTC	STARTED TASK
				WSDWTO	DEADLINE WTO

## WSD - Workstation description record

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
				WSDZCAGN	Z-CENTRIC AGENT WORKSTATION
				WSDWAIT	WAIT WORKSTATION
				WSDVIRT	VIRTUAL WORKSTATION
65	(41)	CHARACTER	1	WSDREP	REPORTING ATTRIBUTE
66	(42)	CHARACTER	2	WSDR1NAM	WS RESOURCE NAME
68	(44)	CHARACTER	2	WSDR1FLG	RESOURCE INDICATORS
				WSDR1PLAN	RESOURCE USED AT PLANNING
				WSDR1CONT	RESOURCE USED AT CONTROL
68	(44)	BITSTRING	1	*	FREE
70	(46)	CHARACTER	2	WSDR2NAM	WS RESOURCE NAME
72	(48)	CHARACTER	2	WSDR2FLG	RESOURCE INDICATORS
				WSDR2PLAN	RESOURCE USED AT PLANNING
				WSDR2CONT	RESOURCE USED AT CONTROL
72	(48)	BITSTRING	1	*	FREE
74	(4A)	CHARACTER	6	WSDUPDAT	LATEST UPDATE, THIS WSD
80	(50)	CHARACTER	4	WSDUPTI	LATEST UPDATE TIME
84	(54)	CHARACTER	8	WSDUSER	ID OF USER WHO MADE THE.. ..LATEST CHANGE TO THIS WS
92	(5C)	CHARACTER	8	WSDSUDS	SU/RE DATA SET DDNAME
100	(64)	SIGNED	2	WSDVDES#	NUMBER OF VIRTUAL DEST
102	(66)	BITSTRING	1	WSDFLG1	
				WSDINVOPT	INVALID OPTION SPEC
				WSDDDYN	DYNAMIC SCHEDULING WORKSTATION
				WSDDDYNIO	DYNAMIC INVALID OPT
				*	FREE
103	(67)	CHARACTER	1	WSDPSERV	SERVER USEAGE N/B/P/C
104	(68)	CHARACTER	1	WSDRENG	REMOTE ENGINE TYPE Z/D
105	(69)	CHARACTER	2	*	FREE
107	(6B)	CHARACTER	1	WSDTWS	FTA WORKSTATION
108	(6C)	SIGNED	2	WSDDAY#	TOTAL NO. OF DAYS
110	(6E)	SIGNED	2	WSDTOTIVL#	TOTAL NO. OPEN TIME INTVLS
112	(70)	SIGNED	2	WSDACCM#	0=NO ACC. METH. DATA 1=ACC METH DATA PRESENT
114	(72)	CHARACTER	1	WSDAUTO	SYSTEM AUTOMATION
115	(73)	CHARACTER	1	*	FREE
116	(74)	CHARACTER	8	WSDLUTS	LAST UPDATE TIMESTAMP
124	(7C)	SIGNED	2	WSDEOPT#	0 = 'NO E2E OPTIONS DATA'
126	(7E)	CHARACTER	14	*	FREE
140	(8C)	CHARACTER	*	WSDVARSECT	VARIABLE SECTION

### DAY RELATED INFORMATION

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
140	(8C)	STRUCTURE	52	WSDDAY (*)	
140	(8C))	CHARACTER	6	WSDDATE	SPECIFIC DATE
140	(8C)	SIGNED	2	WSDDAYNO	1-MONDAY 7-SUNDAY 8-STAND
146	(92)	CHARACTER	24	WSDDESD	DESCRIPTION OF DAY
170	(AA)	BITSTRING	1	WSDDFLG	
				WSDDSPECIFIC	SPECIFIC DAY INDICATOR
171	(AB)	CHARACTER	13	*	FREE
184	(B8)	SIGNED	4	WSDDIVL#	NO. OF INTERVALS

## WSD - Workstation description record

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
188	(BC)	SIGNED	4	WSDIVL_IX	INDEX OF FIRST OPEN TIME.. ..INTERVAL FOR THIS DAY

### OPEN TIME INTERVAL INFORMATION

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	32	WSDIVL (*)	
0	(0)	CHARACTER	4	WSDSTART	START TIME OF INTERVAL
4	(4)	CHARACTER	4	WSDENDT	END TIME OF INTERVAL
8	(8)	SIGNED	2	WSDSERV#	NUMBER OF PARALLEL SERVERS
10	(A)	SIGNED	2	WSDR1CAP	RESOURCE CAPACITY
12	(C)	SIGNED	2	WSDR2CAP	RESOURCE CAPACITY
14	(E)	CHARACTER	4	WSDAWS	ALTERNATE WS NAME
18	(12)	CHARACTER	14	*	FREE

### ACCESS METHOD INFORMATION

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	72	WSDACC (*)	
0	(0)	CHARACTER	12	WSDACCMN	ACCESS METHOD NAME
12	(C)	CHARACTER	52	WSDADR	SAP HOST ADDRESS
12	(C)	CHARACTER	26	WSDADR1	SAP HOST ADDRESS
38	(26)	CHARACTER	26	WSDADR2	SAP HOST ADDRESS
64	(40)	SIGNED	4	WSDPORT	SAP PORT NUMBER
68	(44)	CHARACTER	4	*	FREE

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	16	WSDVDES (*)	
0	(0)	CHARACTER	8	WSDVDNAM	REAL DESTINATION
8	(8)	SIGNED	4	WSDVDID	WSV ID
12	(C)	CHARACTER	4	*	FREE

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	173	WSDEOPT (*)	
0	(0)	CHARACTER	47	WSDEOJU	DEFAULT USER NAME
47	(2F)	CHARACTER	1	WSDEOJP	PASSWORD SPECIFIED
48	(30)	CHARACTER	40	WSDEOJT	DEFAULT ACCESS METHOD
88	(58)	CHARACTER	1	WSDEOBR	IS A BROKER (Y/N)
89	(59)	CHARACTER	40	WSDEOPL	BROKER AGENT POOL NAME
129	(81)	CHARACTER	40	WSDEODP	BROKER DYNAMIC POOL
169	(A9)	CHARACTER	4	*	FREE

## Cross reference

Name	Hex Offset	Hex Value	Level
WSD	0		1
WSDACC	0		1
WSDACCM#	70		3

## WSD - Workstation description record

Name	Hex Offset	Hex Value	Level
WSDACCMN	0		2
WSDADR	C		2
WSDADR1	C		3
WSDADR2	26		3
WSDAUTO	72		3
WSDAWS	E		2
WSDCOMMON	0		2
WSDDATE	8C		2
WSDDAY	8C		1
WSDDAY#	6C		3
WSDDAYNO	8C		3
WSDDESCR	1F		3
WSDDESD	92		2
WSDDFLG	AA		2
WSDDIVL#	B8		2
WSDDSPECIFIC	AA	80	3
WSDDYN	66	40	4
WEDDYNIO	66	20	4
WSDENDT	4		2
WSDEOBR	58		2
WSDEODP	81		2
WSDEOJP	2F		2
WSDEOJT	30		2
WSDEOJU	0		2
WSDEOPL	59		2
WSDEOPT	0		1
WSDEOPT#	7C		3
WSDEYE	A		3
WSDFLG	40		3
WSDFLG1	66		3
WSDINVOPT	66	80	4
WSDIVL	0		1
WSDIVL_IX	BC		2
WSDKEY	6		3
WSDLUTS	74		3
WSDNAME	6		4
WSDOPDUR	13		3
WSDPORT	40		2
WSDPREP	40	80	4
wsdpserv	67		3
WSDPSJT	40	40	4
WSDRENG	68		3
WSDREP	41		3
WSDROUT	17		3
WSDRSEQ#	66		3
WSDR1CAP	A		2
WSDR1CONT	44	40	4
WSDR1FLG	44		3
WSDR1NAM	42		3
WSDR1PLAN	44	80	4
WSDR2CAP	C		2

## WSD - Workstation description record

Name	Hex Offset	Hex Value	Level
WSDR2CONT	48	40	4
WSDR2FLG	48		3
WSDR2NAM	46		3
WSDR2PLAN	48	80	4
WSDSERV#	8		2
WSDSPLIT	40	20	4
WSDSSEQ#	64		3
WSDSTART	0		2
WSDSTC	40	10	4
WSDSUDS	5C		3
WSDTOTIVL#	6E		3
WSDTRSPT	F		3
WSDTWS	6B		3
WSDTYPE	3F		3
WSDUPDAT	4A		3
WSDUPTI	50		3
WSDUSER	54		3
WSDVARSECT	8C		2
WSDVERS	E		3
WSDVIRT	40	01	4
WSDWAIT	40	02	4
WSDWTO	40	08	4
WSDZCAGN	40	04	4

## WSN - Workstation resource report record in DP

Name : DCLWSN

Function:

Describes layout of parallel servers, R1 & R2 indicating the planned workstation load measured in parallel servers, R1 and R2 units. There is one record for each workstation and 'day' in the plan. A 'day' starts|ends on the time given in planhour. For each 15 minutes is recorded the amount of r1/r2 resources needed (according to the operation descriptions) times 15 and planned server minutes for all operations with start-end interval covering the interval (if 1/3 of the interval covered - 1/3\*amount) an example: An operation planned between 14.30 and 14.48 using 1 server, 50 r1, and 2 r2 will record 15 server minutes, 15\*50 r1 units and 15\*2 r2 units in the 14.30-14.45 slot & will record 3 server minutes, 3\*50 r1 units and 3\*2 r2 units in the 14.45-15.00 slot. The records have the standard rectx and keysize of DPIN records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	273	WSNAREA	PARALLEL SERV   R1   R2 REC
0	(0)	CHARACTER	74	WSNKEY	KEY
0	(0)	SIGNED	2	WSNTYPE	ALWAYS TYPE 3
2	(2)	CHARACTER	8	WSNROUT	REPORT ROUTING
10	(A)	CHARACTER	4	WSNWSID	WORKSTATION ID
14	(E)	SIGNED	2	WSNSTYPE	SUBTYPE SERVER MINUTES= 3 R1 = 4 R2 = 5
16	(10)	CHARACTER	6	WSNDATE	REPORT 'DAY' (YYMMDD)
22	(16)	CHARACTER	2	WSNSTRNG	R1   R2 STRING IN REPORTS BLANK FOR PARALLEL SERV
24	(18)	CHARACTER	1	WSNRPLN	RESOURCE PLANNING Y   N

## WSN - Workstation resource report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
25	(19)	CHARACTER	34	*	ADJUST TO KEYLENGTH
59	(3B)	CHARACTER	15	*	TO ADD UP TO 74 BYTES
74	(4A)	CHARACTER	199	WSNDATA	DATA PART OF WSN RECORD
74	(4A)	SIGNED	2	WSNFACT	FACTOR TO MULTIPLY AMOUNT
76	(4C)	UNSIGNED	1	WSNAMT (96)	OF RESOURCES
172	(AC)	UNSIGNED	1	WSNLIM (96)	LIMIT OF RESOURCES
268	(10C)	CHARACTER	5	*	TO ADD UP TO STD RECSIZE

## Cross reference

Name	Hex Offset	Hex Value	Level
WSNAMT	4C		3
WSNAREA	0		1
WSNDATA	4A		2
WSNDATE	10		3
WSNFACT	4A		3
WSNKEY	0		2
WSNLIM	AC		3
WSNROUT	2		3
WSNRPLN	18		3
WSNSTRNG	16		3
WSNSTYPE	E		3
WSNTYPE	0		3
WSNWSID	A		3

## WSP - Workstation plan report record in DP

Name : DCLWSP

Function:

describes layout of wsp records representing report data on operations on certain workstations in the new current plan. New first operations may appear both as an ordinary all operations record (subtype 16) and a first operation record (subtype 32) depending on report options selected. Note that there is additional record for all predecessors after the 2nd (see DCLDAIOP). An additional subtype of record is used to represent opentime interval (changes) with a key that sorts the opentime record before the operations planned in the opentime. The records have the standard recsize and keysize of DPIN records.

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	250	WSPAREA	WSP RECORD
0	(0)	CHARACTER	132	WSPKEY	KEY
0	(0)	SIGNED	2	WSPTYPE	TYPE IS ALWAYS 3
2	(2)	CHARACTER	8	WSPROUT	REPORT ROUTING
10	(A)	CHARACTER	4	WSPWSID	WSID OF OPERATION
14	(E)	SIGNED	2	WSPSTYPE	SUBTYPE 1 = (ALL) OPER. SUBTYPE 2 = FIRST OPER.
16	(10)	CHARACTER	1	WSPNONR	NONREPORTING WS (Y N)
17	(11)	CHARACTER	10	WSPPLNS	OPERATION PLANNED START (OR WSO OPENTIME START)
17	(11)	CHARACTER	6	WSPPLNSD	DAY (YYMMDD)

## WSP - Workstation plan report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
23	(17)	CHARACTER	4	WSPPLNST	TIME (HHMM)
23	(17)	CHARACTER	2	WSPPLNSH	TIME (HH )
25	(19)	CHARACTER	2	WSPPLNSM	TIME ( MM)
27	(1B)	UNSIGNED	1	WSPSSTYP	1 = OPENTIME RCD 2 = ORDINARY OPERATION RCD
THE ABOVE FIELDS FILLED IN FOR ALL RECORD TYPES					
28	(1C)	CHARACTER	10	WSPOCIA	OCC IA AFTER MCP
28	(1C)	CHARACTER	6	WSPOCIAD	DAY (YYMMDD)   BLANK
34	(22)	CHARACTER	4	WSPOCIAT	TIME (HHMM)   BLANK
34	(22)	CHARACTER	2	WSPOCIAH	TIME (HH )
36	(24)	CHARACTER	2	WSPOCIAM	TIME ( MM)
38	(26)	CHARACTER	19	WSPID	
38	(26)	CHARACTER	16	WSPADID	APPLICATION ID OF OPER.
54	(36)	CHARACTER	3	WSPOPNO	OPERATION NUMBER
57	(39)	CHARACTER	41	WSPPRE	OPERATION PRED   BLANK
57	(39)	CHARACTER	16	WSPPREOC	PREDECESSOR ADID
73	(49)	CHARACTER	3	WSPPREOP	PREDECESSOR OP NO   BLANK
76	(4C)	CHARACTER	4	WSPPREWS	PREDECESSOR WSID   BLANK
80	(50)	CHARACTER	8	WSPPREJN	PREDECESSOR JOBNAME   BLANK
88	(58)	CHARACTER	10	WSPPREIA	YYMMDDHHMM PRED IA   BLANK
88	(58)	CHARACTER	6	WSPPREID	YYMMDD
94	(5E)	CHARACTER	2	WSPPREIH	HH
96	(60)	CHARACTER	2	WSPPREIM	MM
98	(62)	CHARACTER	34	*	ADJUST HEYLENGTJH
132	(84)	CHARACTER	118	WSPDATA	DATA PART OF WSP RECORD
132	(84)	CHARACTER	1	WSPOPRI	OPERATION PRIORITY
133	(85)	CHARACTER	1	WSPWSTYP	WORKSTATION TYPE
134	(86)	CHARACTER	8	WSPOPJOB	OPERATION JOBNAME
142	(8E)	CHARACTER	24	WSPOPTXT	OPERATION TEXT
166	(A6)	CHARACTER	2	WSPOPPTS	PARALLEL SERVERS
168	(A8)	CHARACTER	2	WSPOPRI1	OPERATION R1 RESOURCE
170	(AA)	CHARACTER	2	WSPOPRI2	OPERATION R2 RESOURCE
172	(AC)	CHARACTER	8	WSPOPRES	ID OF CRITICAL RESOURCE
180	(B4)	CHARACTER	1	WSPOPEXC	Y = EXCLUSIVE USE
181	(B5)	CHARACTER	1	WSPOPST	OPERATION STATUS
182	(B6)	CHARACTER	1	WSPOPRES	Y = PLANNED RERUN, ELSE N
183	(B7)	CHARACTER	4	WSPOPDUR	OPERATION DURATION HHMM REMAINING
187	(BB)	CHARACTER	8	WSPOPFRM	OPERATION FORMNUMBER
195	(C3)	CHARACTER	1	WSPOPCLS	OPERATION JOB   SYSOUT CLASS
196	(C4)	CHARACTER	10	WSPPLNE	OPERATION PLANNED END
196	(C4)	CHARACTER	6	WSPPLNED	DAY (YYMMDD)
202	(CA)	CHARACTER	4	WSPPLNET	TIME (HHMM)
202	(CA)	CHARACTER	2	WSPPLNEH	TIME (HH )
204	(CC)	CHARACTER	2	WSPPLNEM	TIME ( MM)
206	(CE)	CHARACTER	10	WSPOPLU	OPERATION LATEST OUT
206	(CE)	CHARACTER	6	WSPOPLUD	DAY (YYMMDD)
212	(D4)	CHARACTER	4	WSPOPLUT	TIME (HHMM)
212	(D4)	CHARACTER	2	WSPOPLUH	TIME (HH )
214	(D6)	CHARACTER	2	WSPOPLUM	TIME ( MM)
216	(D8)	CHARACTER	1	WSPOPLD	Y IF DL = LATESTOUT ELSE N
217	(D9)	CHARACTER	16	WSPOWNER	APPLICATION OWNER

THE SECTION ABOVE NOT FILLED IN FOR OPENTIME RECORDS THE SECTION BELOW FILLED IN FOR  
OPENTIME RECORDS ONLY

## WSP - Workstation plan report record in DP

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
233	(E9)	CHARACTER	4	WSPWSOET	WS OPENTIME END HHMM
233	(E9)	CHARACTER	2	WSPWSOEH	TIME (HH )
235	(EB)	CHARACTER	2	WSPWSOEM	TIME ( MM)
237	(ED)	CHARACTER	2	WSPWSO#S	WS OPENTIME NO OF SERVERS
THE FIELD BELOW NOT FILLED IN FOR OPENTIME RECORDS					
239	(EF)	CHARACTER	1	WSPNEW	NEW OPR FROM LTP Y   N
THE FIELD FILLED IN FOR 1ST-OPER-SUBTYPE ONLY					
240	(F0)	CHARACTER	10	WSPOPIA	OPR IA (OR = OCC IA)
240	(F0)	CHARACTER	6	WSPOPIAD	DAY (YYMMDD)
246	(F6)	CHARACTER	4	WSPOPIAT	TIME (HHMM)
246	(F6)	CHARACTER	2	WSPOPIAH	TIME (HH )
248	(F8)	CHARACTER	2	WSPOPIAM	TIME ( MM)

## Cross reference

Name	Hex Offset	Hex Value	Level
WSPADID	26		4
WSPAREA	0		1
WSPDATA	84		2
WSPID	26		3
WSPKEY	0		2
WSPNEW	EF		3
WSPNONR	10		3
WSPOCIA	1C		3
WSPOCIAD	1C		4
WSPOCIAH	22		5
WSPOCIAM	24		5
WSPOCIAT	22		4
WSPOPCLS	C3		3
WSPOPDL	D8		3
WSPOPDUR	B7		3
WSPOPEXC	B4		3
WSPOPFRM	BB		3
WSPOPIA	F0		3
WSPOPIAD	F0		4
WSPOPIAH	F6		5
WSPOPIAM	F8		5
WSPOPIAT	F6		4
WSPOPJOB	86		3
WSPOPLU	CE		3
WSPOPLUD	CE		4
WSPOPLUH	D4		5
WSPOPLUM	D6		5
WSPOPLUT	D4		4
WSPOPNO	36		4
WSPOPPRI	84		3
WSPOPPS	A6		3
WSPOPRER	B6		3
WSPOPRES	AC		3
WSPOPR1	A8		3



## WSP - Workstation plan report record in DP

Name	Hex Offset	Hex Value	Level
WSPOPR2	AA		3
WSPOPST	B5		3
WSPOPTXT	8E		3
WSPOWNER	D9		3
WSPPLNE	C4		3
WSPPLNED	C4		4
WSPPLNEH	CA		5
WSPPLNEM	CC		5
WSPPLNET	CA		4
WSPPLNS	11		3
WSPPLNSD	11		4
WSPPLNSH	17		5
WSPPLNSM	19		5
WSPPLNST	17		4
WSPPRE	39		3
WSPPREIA	58		4
WSPPREID	58		5
WSPPREIH	5E		5
WSPPREIM	60		5
WSPPREJN	50		4
WSPPREOC	39		4
WSPPREOP	49		4
WSPPREWS	4C		4
WSPROUT	2		3
WSPSSTYP	1B		3
WSPSTYPE	E		3
WSPTYPE	0		3
WSPWSID	A		3
WSPWSO#S	ED		3
WSPWSOEH	E9		4
WSPWSOEM	EB		4
WSPWSOET	E9		3
WSPWSTYP	85		3

## WSV - Virtual workstation description record

Name : DCLWSV

Function:

This segment declares a virtual workstation definition, physically located in the workstation description database (EQQWSDS). For each actual destination associated to a virtual workstation, defines the same kind of information as WSD. The WSV structure is as follows:

- 1 WSV
- 2 common data
- 2 a table with one row per day defined describing the day
- 2 a table with one row per open time interval describing the interval

Each entry in the day table contains an index into the interval table for the first interval defined for that particular day.

Offsets	Type	Len	Name	Description
0	(0) CHARACTER	76	WSVCOMMON	
0	(0) CHARACTER	2	WSVKEYID	ALWAYS '22'

## WSV - Virtual workstation description record

2	(2)	CHARACTER	8	WSVKEY	
2	(2)	CHARACTER	4	WSVWSNAM	WORKSTATION NAME
6	(6)	SIGNED	4	WSVSEQNO	DESTINATION ID
10	(A)	CHARACTER	4	WSVEYE	EYECATCHER 'WSV '
14	(E)	UNSIGNED	1	WSVVERS	VERSION NUMBER
15	(F)	CHARACTER	1	WSVPSERV	SERVER USAGE (N/C)
16	(10)	CHARACTER	8	*	FREE
24	(18)	CHARACTER	8	WSVDESTN	DESTINATION NAME
32	(20)	SIGNED	2	WSVDAY#	NUMBER OF DAYS
34	(22)	SIGNED	2	WSVTOTIVL#	NUMBER OF IVL
36	(24)	CHARACTER	8	WSVLUTS	LAST UPDATE TOD
44	(2C)	CHARACTER	8	WSVUSER	LAST UPDATE USER
52	(34)	CHARACTER	6	WSVUPDAT	LATEST UPDATE, THIS WSD
58	(3A)	CHARACTER	4	WSVUPTI	LATEST UPDATE TIME
62	(3E)	CHARACTER	2	WSVR1NAM	WS RESOURCE NAME
64	(40)	CHARACTER	2	WSVR1FLG	RESOURCE INDICATORS
		1... ..		WSVR1PLAN	RESOURCE USED AT PLANNING
		.1... ..		WSVR1CONT	RESOURCE USED AT CONTROL
64	(40)	BITSTRING	1	*	FREE
66	(42)	CHARACTER	2	WSVR2NAM	WS RESOURCE NAME
68	(44)	CHARACTER	2	WSVR2FLG	RESOURCE INDICATORS
		1... ..		WSVR2PLAN	RESPURCE USED AT PLANNING
		.1... ..		WSVR2CONT	RESOURCE USED AT CONTROL
68	(44)	BITSTRING	1	*	FREE
70	(46)	CHARACTER	6	*	FREE
76	(4C)	CHARACTER	*	WSVVARSECT	VARIABLE SECTION

### DAY RELATED INFORMATION

Offsets	Type	Len	Name	Description
76	(4C)	STRUCTURE	52 WSDAY(*)	
76	(4C)	CHARACTER	6 WSDATE	SPECIFIC DATE
76	(4C)	SIGNED	2 WSDAYNO	1-MONDAY 7-SUNDAY 8-STAND
82	(52)	CHARACTER	24 WSDESD	DESCRIPTION OF DAY
106	(6A)	BITSTRING	1 WSDFLG	
		1... ..	WSVDSPECIFIC	SPECIFIC DAY INDICATOR
107	(6B)	CHARACTER	13 *	FREE
120	(78)	SIGNED	4 WSDIVL#	NO. OF INTERVALS
124	(7C)	SIGNED	4 WSVIVL_IX	INDEX OF FIRST OPEN TIME.. ..INTERVAL FOR THIS DAY

### OPEN TIME INTERVAL INFORMATION

Offsets	Type	Len	Name	Description
0	(0)	STRUCTURE	32 WSVIVL(*)	
0	(0)	CHARACTER	4 WSVSTART	START TIME OF INTERVAL
4	(4)	CHARACTER	4 WSVENDT	END TIME OF INTERVAL
8	(8)	UNSIGNED	2 WSVSERV#	NUMBER OF PARALLEL SERV
10	(A)	UNSIGNED	2 WSVR1CAP	RESOURCE CAPACITY
12	(C)	UNSIGNED	2 WSVR2CAP	RESOURCE CAPACITY
14	(E)	CHARACTER	4 *	
18	(12)	CHARACTER	14 *	FREE

## Cross reference

NAME	HEX OFFSET	HEX VALUE	LEVEL
WSV	0		1
WSVCOMMON	0		2
WSDATE	4C		2
WSDAY	4C		1
WSDAY#	20		3
WSDAYNO	4C		3
WSDESD	52		2
WSDDESTN	18		3
WSDFLG	6A		2
WSDIVL#	78		2

## WSV - Virtual workstation description record

WSVDSPECIFIC	6A	80	3
WSVENDT	4		2
WSVEYE	A		3
WSVIVL	0		1
WSVIVL_IX	7C		2
WSVKEY	2		3
WSVKEYID	0		3
WSVLUTS	24		3
WSVPSERV	F		3
WSVRICAP	A		2
WSVRICONT	40	40	4
WSVRIFLG	40		3
WSVRINAM	3E		3
WSVR1PLAN	40	80	4
WSVR2CAP	C		2
WSVR2CONT	44	40	4
WSVR2FLG	44		3
WSVR2NAM	42		3
WSVR2PLAN	44	80	4
WSVSEQNO	6		4
WSVSERV#	8		2
WSVSTART	0		2
WSVTOTIVL#	22		3
WSVUPDAT	34		3
WSVUPTI	3A		3
WSVUSER	2C		3
WSVVARSECT	4C		2
WSVVERS	E		3
WSVWSNAM	2		4

### XD01 - XD Header record

Name : DCLXD01

Function:  
This record ...

#### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	244	XDREC01	

Key:

#### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	68	XDKEY01	
0	(0)	CHARACTER	2	XDKYP01	TYPE IS ALWAYS 01
2	(2)	CHARACTER	66	XDKF01	SHOULD CONTAIN BLANKS

Body:

#### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
68	(44)	CHARACTER	176	XDBDY01	HDR RECORD BODY
68	(44)	CHARACTER	4	XDEYE01	EYECATCHER
72	(48)	UNSIGNED	1	XDVERS01	VERSION NUMBER
73	(49)	CHARACTER	1	*	FREE
74	(4A)	CHARACTER	10	XDCR	CURRENT PLAN CREATION

## DCLXD01 - XD Header record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
74	(4A)	CHARACTER	6	XDCRDAT	DATE
80	(50)	CHARACTER	4	XDCRTIM	TIME
84	(54)	CHARACTER	10	XDEND	LAST PLAN NEXT PERIOD END
84	(54)	CHARACTER	6	XDENDAT	DATE
90	(5A)	CHARACTER	4	XDENTIM	TIME
94	(5E)	CHARACTER	10	XDBU	LAST BACKUP
94	(5E)	CHARACTER	6	XDBUDAT	DATE
100	(64)	CHARACTER	4	XDBUTIM	TIME
104	(68)	CHARACTER	10	XDLP	TAIL END
104	(68)	CHARACTER	6	XDLPDAT	DATE
110	(6E)	CHARACTER	4	XDLPTIM	TIME
114	(72)	CHARACTER	10	XDREPS	REPORT PERIOD START
114	(72)	CHARACTER	6	XDREPSD	DATE
120	(78)	CHARACTER	4	XDREPST	TIME
124	(7C)	CHARACTER	10	XDLEVEL	XD level
124	(7C)	CHARACTER	2	XDLEV_VER	-- version
126	(7E)	CHARACTER	8	XDLEV_FMID	-- fmid
134	(86)	CHARACTER	10	XDINIT	blank or 'Init Empty'
144	(90)	CHARACTER	1	XD01DPSET	Y: XD99 to be processed for status change
145	(91)	CHARACTER	99	*	free

### Constants

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
2		DECIMAL	244	MAXLENXD01	
2		CHARACTER	01	XDTP01	first 2 bytes of key
4		CHARACTER	XD01	XDEYEC01	EYEcatcher
1		DECIMAL	1	XDVERSC01	version number

## Cross reference

Name	Hex Offset	Hex Value	Level
XBDY01	44		2
XDBU	5E		3
XDBUDAT	5E		4
XDBUTIM	64		4
XDCR	4A		3
XDCRDAT	4A		4
XDCRTIM	50		4
XDEND	54		3
XDENDAT	54		4
XDENTIM	5A		4
XDEYE01	44		3
XDINIT	86		3
XDKEY01	0		2
XDKF01	2		3
XDKYP01	0		3
XDLEV_FMID	7E		4
XDLEV_VER	7C		4

Name	Hex Offset	Hex Value	Level
XDLEVEL	7C		3
XDLP	68		3
XDLPDAT	68		4
XDLPTIM	6E		4
XDREC01	0		1
XDREPS	72		3
XDREPSD	72		4
XDREPST	78		4
XDVERS01	48		3
XD01DPSET	90		3

## XD02 - XD Header record

Name : DCLXD02

Function:

This record ....

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
0	(0)	STRUCTURE	*	XDREC02	XD HDR RECORD

Key:

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
0	(0)	CHARACTER	68	XDKEY02	
0	(0)	CHARACTER	2	XDKYP02	TYPE IS ALWAYS 02
2	(2)	CHARACTER	64	XDREQ02	
2	(2)	CHARACTER	8	XDKDEST02	REQUESTER DESTINATION
10	(A)	CHARACTER	56	XDKALIAS02	REQUESTER ALIAS
66	(42)	CHARACTER	2	XDKF02	FREE

Body:

Offsets		Type	Len	Name (Dim)	Description
Dec	Hex				
68	(44)	CHARACTER	224	XDBDY02	HDR RECORD BODY
68	(44)	CHARACTER	4	XDEYE02	EYECATCHER
72	(48)	UNSIGNED	1	XDVERS02	VERSION NUMBER
73	(49)	CHARACTER	1	XD02STAT	SUBSCRIBE STATUS (see below)
74	(4A)	UNSIGNED	1	XD02FLAGS	MATCHING CRITERIA FLAGS:
		1... ....		XD02WAITWQA	ON: started on a wait ws
		.1. ....		XD02FAILNFY	ON: failed to notify
		..1. ....		XD02EVOP	ON: started executing
		...1 ....		XD02RECOV	ON: recovery in progress
		.... 1111		*	FREE
75	(4B)	UNSIGNED	1	*	FREE
76	(4C)	CHARACTER	8	XD02TOK	XD02 ID: CREATION TOD
84	(54)	SIGNED	2	XD02ADEST#	Number of alternate Dest
86	(56)	SIGNED	2	XD02OPN	OPERATION NUMBER TO BIND

## DCLXD02 - XD Header record

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
88	(58)	CHARACTER	16	XD02ADID	APPLICATION NAME TO BIND
104	(68)	CHARACTER	10	XD02BASEIA	Base IA for matching
104	(68)	CHARACTER	6	XD02BASEIAD	- YYMMDD
110	(6E)	CHARACTER	4	XD02BASEIAT	- HHMM
114	(72)	CHARACTER	10	XD02IFROMIA	match Interval start:
114	(72)	CHARACTER	6	XD02IFROMIAD	- YYMMDD
120	(78)	CHARACTER	4	XD02IFROMIAT	- HHMM
124	(7C)	CHARACTER	10	XD02ITOIA	match Interval end:
124	(7C)	CHARACTER	6	XD02ITOIAD	- YYMMDD
130	(82)	CHARACTER	4	XD02ITOIAT	- HHMM
134	(86)	CHARACTER	26	XD02LTPKEY	LTP key (used during pending)
134	(86)	CHARACTER	6	XD02LOCCDATE	- Run dateYYMMDD
140	(8C)	CHARACTER	16	XD02LOCCNAME	- Application Name
156	(9C)	CHARACTER	4	XD02LOCCTIME	- IA time HHMM
160	(A0)	CHARACTER	8	XD02CP3COCCTOK	Occurrence Token of operation
168	(A8)	CHARACTER	10	XD02JSTART	Matched job start
168	(A8)	CHARACTER	6	XD02JSTARTD	... date
174	(AE)	SIGNED	4	XD02JSTARTT	... time
178	(B2)	CHARACTER	1	XD02JSTAT	Matched job status
179	(B3)	CHARACTER	1	*	FREE
180	(B4)	CHARACTER	10	XD02JEND	Matched job end
180	(B4)	CHARACTER	6	XD02JENDD	... date
186	(BA)	SIGNED	4	XD02JENDT	... time
190	(BE)	CHARACTER	8	XD02JNAME	Matched job name
198	(C6)	CHARACTER	4	XD02JEC	Matched job error code
202	(CA)	CHARACTER	4	XD02WSNAME	matched ws name
206	(CE)	SIGNED	2	XD02IAGMT	gmt for IA conversion
208	(D0)	SIGNED	2	XD02JSGMT	gmt for start time conv
210	(D2)	SIGNED	2	XD02JEGMT	gmt for end time conv
212	(D4)	SIGNED	4	XD02DIDX	destination index
216	(D8)	SIGNED	4	XD02JADUR	actual duration in secs
220	(DC)	CHARACTER	72	*	FREE

Variable part:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
292	(124)	CHARACTER	*	XDVAR02	VAR DATA

Alternate dest variable part:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	16	XDADEST(*)	
0	(0)	CHARACTER	8	XDADESTNAME	DESTINATION NAME
8	(8)	SIGNED	4	XDADIDX	DESTINATION DTB index
12	(C)	SIGNED	4	*	free

Constants

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
2		CHARACTER	02	XDTYP02	first 2 bytes of key
4		CHARACTER	XD02	XDEYEC02	EYEcatcher
1		CHARACTER	1	XDVERSC02	version number
1		CHARACTER	L	WAITLT_XD2	L waiting for LTP
1		CHARACTER	K	LTLOCK_XD2	K waiting for LTP lock
1		CHARACTER	P	WAITCP_XD2	P waiting for CP
1		CHARACTER	S	SENDCH_XD2	S sending status changes
1		CHARACTER	E	NOTBND_XD2	E not bound
1		CHARACTER	C	KILLED_XD2	C killed
1		CHARACTER	D	DELETE_XD2	D deleted

## Cross reference

Name	Hex Offset	Hex Value	Level
XDADEST	0		1
XDADESTNAME	0		2
XDADIDX	8		2
XDBDY02	44		2
XDEYE02	44		3
XDKALIAS02	A		4
XDKDEST02	2		4
XDKEY02	0		2
XDKF02	42		3
XDKYP02	0		3
XDREC02	0		1
XDREQ02	2		3
XDVAR02	124		2
XDVERS02	48		3
XD02ADEST#	54		3
XD02ADID	58		3
XD02BASEIA	68		3
XD02BASEIAD	68		4
XD02BASEIAT	6E		4
XD02CP3COCCTOK	A0		3
XD02DIDX	D4		3
XD02EVOP	4A	20	4
XD02FAILNFY	4A	40	4
XD02FLAGS	4A		3
XD02IAGMT	CE		3
XD02IFROMIA	72		3
XD02IFROMIAD	72		4
XD02IFROMIAT	78		4
XD02ITOIA	7C		3
XD02ITOIAD	7C		4
XD02ITOIAT	82		4
XD02JADUR	D8		3
XD02JEC	C6		3
XD02JEGMT	D2		3
XD02JEND	B4		3
XD02JENDD	B4		4

## DCLXD02 - XD Header record

Name	Hex Offset	Hex Value	Level
XD02JENDT	BA		4
XD02JNAME	BE		3
XD02JSGMT	D0		3
XD02JSTART	A8		3
XD02JSTARTD	A8		4
XD02JSTARTT	AE		4
XD02JSTAT	B2		3
XD02LOCCDATE	86		4
XD02LOCCNAME	8C		4
XD02LOCCTIME	9C		4
XD02LTPKEY	86		3
XD02OPN	56		3
XD02RECOV	4A	10	4
XD02STAT	49		3
XD02TOK	4C		3
XD02WAITWQA	4A	80	4
XD02WSNAME	CA		3

## XD98 - XD Index record

Name : DCLXD98

Function:

This record ....

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	164	XDREC98	XD INDEX RECORD

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	68	XDKEY98	
0	(0)	CHARACTER	2	XDKYP98	TYPE IS ALWAYS 99
2	(2)	CHARACTER	56	XDKALIAS98	XD02 TOK KEY
58	(3A)	CHARACTER	10	XDKF98	FREE

Body:

### Offsets

Dec	Hex	Type	Len	Name (Dim)	Description
68	(44)	CHARACTER	96	XDBDY98	HDR RECORD BODY
68	(44)	CHARACTER	4	XDEYE98	EYECATCHER
72	(48)	UNSIGNED	1	XDVERS98	VERSION NUMBER
73	(49)	UNSIGNED	3	*	free
76	(4C)	CHARACTER	8	XDDEST98	DESTINATION
84	(54)	CHARACTER	80	*	FREE

Constants



Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
2		CHARACTER	98	XDTYP98	first 2 bytes of key
4		CHARACTER	XD98	XDEYEC98	EYEcatcher
1		DECIMAL	1	XDVERSC98	version number

## Cross reference

Name	Hex Offset	Hex Value	Level
XDBDY98	44		2
XDDEST98	4C		3
XDEYE98	44		3
XDKALIAS98	2		3
XDKEY98	0		2
XDKF98	3A		3
XDKYP98	0		3
XDREC98	0		1
XDVERS98	48		3

## XD99 - XD Index record

Name : DCLXD99

Function:

This record ....

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	STRUCTURE	225	XDREC99	XD INDEX RECORD

Key:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
0	(0)	CHARACTER	68	XDKEY99	
0	(0)	CHARACTER	2	XDKYP99	TYPE IS ALWAYS 99
2	(2)	CHARACTER	8	XDKTOK99	XD02 TOK KEY
10	(A)	CHARACTER	58	XDKF99	FREE

Body:

Offsets					
Dec	Hex	Type	Len	Name (Dim)	Description
68	(44)	CHARACTER	157	XDBDY99	HDR RECORD BODY
68	(44)	CHARACTER	4	XDEYE99	EYECATCHER
72	(48)	UNSIGNED	1	XDVERS99	VERSION NUMBER
73	(49)	CHARACTER	64	XD99_XD02	XD02 key
73	(49)	CHARACTER	8	XD99DEST	- DESTINATION
81	(51)	CHARACTER	56	XD99ALIAS	- ALIAS
137	(89)	CHARACTER	8	XD99OCCTOK	- OCC TOKEN
145	(91)	CHARACTER	1	XD99STAT	XD02 status

## DCLXD99 - XD Index record

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
146	(92)	CHARACTER	1	XD99DPSET	'Y' when DP batch changes job status (OPRDPSET=on) NOTE: it is left 'Y' until NMM/EM process it	
147	(93)	CHARACTER	78	*	FREE	

### Constants

Offsets						
Dec	Hex	Type	Len	Name (Dim)	Description	
2		CHARACTER	99	XDTYP99	first 2 bytes of key	
4		CHARACTER	XD99	XDEYEC99	EYEcatcher	
1		DECIMAL	1	XDVERSC99	version number	

## Cross reference

Name	Hex Offset	Hex Value	Level
XDBDY99	44		2
XDEYE99	44		3
XDKEY99	0		2
XDKF99	A		3
XDKTOK99	2		3
XDKYP99	0		3
XDREC99	0		1
XDVERSC99	48		3
XD99_XD02	49		3
XD99ALIAS	51		4
XD99DEST	49		4
XD99DPSET	92		3

---

## Chapter 6. DB2 tables

These tables are used by the CP History function. The names are aliases used by Tivoli Workload Scheduler for z/OS. Each table description includes information about the table, a description of each of the *key columns*, and a description of each of the *data columns*:

- Key columns are marked like this: **k**. They are sorted in the sequence they appear in the table.
- Data columns follow the last key column and are sorted in alphabetic order.

---

### EQQHIMN

Column name		Data type	Description
HIMNRELEASE	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS release
HIMNSSNAME	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS subsystem name
HIMNCURRVERSION		SMALLINT	Current version number of the history information
HIMNPREVVERSION		SMALLINT	Previous version number of the history information
HIMNMAXVERSION		SMALLINT	Maximum version number of the history information

---

### EQQHI14

Column name		Data type	Description
HI14RELEASE	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS release
HI14SSNAME	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS subsystem name
HI14VERSION	<b>k</b>	SMALLINT	Row version number
HI14APPLID	<b>k</b>	CHAR(16)	Application name
HI14IADATE	<b>k</b>	CHAR(6)	Occurrence input arrival date
HI14IATIME	<b>k</b>	CHAR(4)	Occurrence input arrival time
HI14OPERNR	<b>k</b>	SMALLINT	Operation number
HI14EXPDATE		CHAR(8)	Expiry date
HI14WSNAME		CHAR(4)	Workstation name
HI14JOBNAME		CHAR(8)	Job name
HI14REC14		VARCHAR(32000)	The job log record

---

### EQQHI3C

Column name		Data type	Description
HI3CRELEASE	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS release
HI3CSSNAME	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS subsystem name
HI3CVERSION	<b>k</b>	SMALLINT	Row version number
HI3CAPPLID	<b>k</b>	CHAR(16)	Application name
HI3CIADATE	<b>k</b>	CHAR(6)	Occurrence input arrival date

## EQQH3C

Column name		Data type	Description
HI3CIATIME	<b>k</b>	CHAR(4)	Occurrence input arrival time
HI3CEXPDATE		CHAR(8)	Expiry date
HI3CREC3C		VARCHAR(32000)	The occurrences record

---

## EQQH3P

Column name		Data type	Description
HI3CRELEASE	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS release
HI3CSSNAME	<b>k</b>	CHAR(4)	Tivoli Workload Scheduler for z/OS subsystem name
HI3CVERSION	<b>k</b>	SMALLINT	Row version number
HI3PAPPLID	<b>k</b>	CHAR(16)	Application name
HI3PIADATE	<b>k</b>	CHAR(6)	Occurrence input arrival date
HI3PIATIME	<b>k</b>	CHAR(4)	Occurrence input arrival time
HI3POPERNR		SMALLINT	Operation number
HI3PEXPDATE		CHAR(8)	Expiry date
HI3PWSNAME		CHAR(4)	Workstation name
HI3PJOBNAME		CHAR(4)	Job name
HI3PREC3P		VARCHAR(32000)	The operation record

---

## Appendix A. Abend codes

---

### 1102

**Explanation:** Undefined feedback from VTAM, or a serious error after a VTAM request that makes continued processing impossible.

**Problem determination:** See message EQQV015E, which precedes this abend, for diagnostic information. Message EQQV015E is issued only if request parameter list (RPL) feedback is available.

**System programmer response:** If an undefined feedback code was returned by VTAM, this is a VTAM problem. Call your IBM representative.

---

### 1103

**Explanation:** VTAM has detected an error while processing a request, or VTAM has detected an error in an associated session, task, or address space.

**Problem determination:** None.

**System programmer response:** Call your IBM representative.

---

### 1104

**Explanation:** Serious error opening the network communication function (NCF) ACB. The VTAM definition of the Tivoli Workload Scheduler for z/OS NCF is probably in error.

**Problem determination:** See message EQQV027E, which precedes this abend, for diagnostic information.

**System programmer response:** If the diagnosis points to a user-definition error, correct the error and restart the subsystem. Otherwise, call your IBM representative.

---

### 1110

**Explanation:** Unrecoverable error when scheduling a VTAM macro.

**Problem determination:** See message EQQV015E, which precedes this abend, for diagnostic information. Message EQQV015E is issued only if request parameter list (RPL) feedback is available.

**System programmer response:** Call your IBM representative.

---

### 1111

**Explanation:** Invalid SCB block or invalid pointer to it (internal error).

**Problem determination:** None.

---

**System programmer response:** Call your IBM representative.

---

### 1112

**Explanation:** Invalid NAB block or invalid pointer to it (internal error).

**Problem determination:** None.

**System programmer response:** Call your IBM representative.

---

### 1113

**Explanation:** Invalid BIB block or invalid pointer to it (internal error).

**Problem determination:** None.

**System programmer response:** Call your IBM representative.

---

### 1121

**Explanation:** All entries in the node table have been used (internal error).

**Problem determination:** None.

**System programmer response:** Call your IBM representative.

---

### 1124

**Explanation:** Invalid action code (internal error).

**Problem determination:** None.

**System programmer response:** Call your IBM representative.

---

### 2001

**Explanation:** Problem accessing the special resource data space during daily planning, and the VALEACTION keyword of BATCHOPT specifies ABEND.

**Problem determination:** None.

**System programmer response:** Take a copy of the old current-plan file, the EQQCXDS file, and the EQQRDDS file, and call your IBM representative.

---

### 3900

**Explanation:** Not enough storage available to continue processing.

---

## Abend codes

**Problem determination:** None.

**System programmer response:** Make sure that the region size specified for the system meets the Tivoli Workload Scheduler for z/OS requirements. Region size requirements are documented in the *Installation Guide* and in the *Program Directory*. If your region size is too small, enlarge it accordingly, and restart the system. Otherwise, call your IBM representative.

---

### 3999

**Explanation:** Tivoli Workload Scheduler for z/OS internal validity checking has discovered an error condition (internal error). A message that contains the reason for the abend, as well as other debugging information, is written to the Tivoli Workload Scheduler for z/OS diagnostic file, EQQDUMP.

**Problem determination:** None.

**System programmer response:** Call your IBM representative.

---

## Appendix B. Problem description sheet

Customer number:	Date:
Problem number:	APAR number:
<b>Program specification - Program Number 5698-A17</b>	
Tivoli Workload Scheduler for Z/OS release level:	PUT level:
<b>Problem Description:</b>	
First indication of the problem:	
What were you trying to do?	
Has the function worked before?	
<b>Type of failure</b>	
Choose one of the following problem-type keywords:	
* ABEND code:	*ABENDU: ID or SEQ NO, if any:
Occurred in module:	Date of the module's compilation:
Offset into the module:	CSECT: CSECT offset:
* MSG. Message ID:	Does the message contain any return codes, reason codes, feedback codes, or error codes? If so, which codes?
* LOOP. Occurred in module:	Date of the module's compilation:
Offset into the module:	CSECT: CSECT offset:
* WAIT. Occurred in module:	Date of the module's compilation:
Offset into the module:	CSECT: CSECT offset:

**Continued on next page**

Figure 9. Part 1 of 2

## Problem description sheet

* INCORROUT:	* PERFM:		
* DOC order number:	Page(s):	Description:	
<b>Information about the failing function</b>			
Choose one of the following areas that best fits the symptoms of your problem:			
* Installing Tivoli Workload Scheduler for z/OS	Did the failure occur during SMP/E (1) receive, (2) apply, or (3) accept?		
* Supplied JCL	Name of the failing job:	%	
* Tivoli Workload Scheduler for z/OS command	Command:	% (and command modifier, if any)	
<b>Hardware used</b>			
Is the problem specific to a type of hardware device? If so, supplement your keyword string with the device type: D/T			%
<b>Software used</b>			
Specify the software used at the time of the problem (version, release, modification level):			
* z/OS:	* ACF/VTAM:		
* JES2/3:	* DFP:		
* ISPF:	* RACF:		
<b>Exits used</b>			
Are you running any exits with the product? If so, which ones?:			
Can you remove or bypass an exit and re-create the problem?			
Is any other user-written code executing (CLISTs, programs, panel changes) in the scheduler's environment?			
Can this be bypassed and the function you were attempting then be successfully executed?			
<b>Note:</b> You can use information marked with a percent sign (%) to supplement your keyword string.			

Figure 10. Part 2 of 2

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