Adabas Review

Adabas Review Reference

Version 4.6.2

March 2013

This document applies to Adabas Review Version 4.6.2.

Specifications contained herein are subject to change and these changes will be reported in subsequent release notes or new editions.

Document ID: REV-REF-462-20130315

Table of Contents

1 Command Reference

This documentation describes the commands that may be used in Adabas Review, and the use of function codes and commands to navigate through the system. All function codes and most commands have been introduced in context in other parts of this documentation.

The commands described in this section may be used within Adabas Review. Some may be entered on the command line of any Adabas Review screen; others are specific to a particular function. Refer to the description of the particular command for more information.

Terms enclosed in (square) brackets (e.g., [report-name]) are optional. Braces ({ }) enclose possible (mutually exclusive) options. Unless qualified by (square) brackets ([ ]), one of the terms listed within the braces must be chosen.

Please note that the following commands may be used throughout Adabas Review:

```
COLOR
EXIT
FIN
HELP
LOGO
MENU
MSG
QUIT
```

These commands are also described in section *Using Adabas Review Commands* in *Adabas Review Concepts Manual*.

Issuing Commands

To issue an Adabas Review command:

- Type the command on the command line and press ENTER

  Or:

  Press the PF key corresponding to the command, if applicable.

Command List -- Quick Reference

The following table lists all of the commands available for use in Adabas Review. This table is provided as a quick reference of the commands.

Command	Use to...
AA	list target objects for a particular SVC
ACCPT	accept (temporarily save) selections or changes to selections
AH	list available Adabas Review hubs
AOS **or** AO	access Adabas Online System
CD	change DBID
CH	compress history data
CL	close (suspend) report
COLOR *{[ON]|OFF}*	display color attributes or turn color off
CONVERT HISTORY	convert history data from one release to another, if requested
CM	manage the client reporting engine (turn it on or off)
CP *[report-name]*	change display program
CR	copy report definition
DBID=*dbid*	change the database
DD	display report information
DL *[report-name]*	download report output or history data
EB	access and edit Buffer Pool Report
EC	access and edit a client report
EL	Edit Pulse report
EP *[report-name]*	access and edit display program
ER *[report-name]*	access and edit report definition
ES	access the Specialty Report Types menu, which provides access to the buffer pool, pulse, client monitor, and cluster services reports. This menu also allows you to review client monitor management settings.
ET *[target-number]*	access and edit target object definitions
EU *[{DEFAULT | userid}]*	access and edit user profile
EX	expand list of history reports
EXIT	return to previous screen . When this command is entered on the Main Menu, the Adabas Review Natural user exit, P-UEXIT3, is run.
FIELD *[field-type1 field-type2 ...]*	list database fields

Command	Use to...
FIN	terminate Adabas Review session
FLDS *[field-type1 field-type2 ...]*	list database fields
GENAUTO **or** GA	force regeneration of control statements for all autostarted reports
GENCARD **or** GC	generate report parameter cards for user-specified reports
HC *[report-name]*	print report output or history data (hard copy)
HELP	display help for screen or field
HUB=*hubid*	change the hub database
IN	display storage and processing information for active reports
LF *[field-type1 field-type2 ...]*	list database fields
LH	list history reports
LOG	in local mode only, reset selected parameters dynamically
LOGO	display Adabas Review logo screen
LOGON *library-name*	logon to the specified library
LR	list report definitions
LS	list started reports
LT	list target object definitions
LU	list user profiles
MENU	access the Adabas Review main menu
MSG *[message-number]*	display detailed explanation of the specified Adabas Review message
NAT	exit Adabas Review and return to Natural
NUC LIST	monitor specific nucleus IDs separately when running in local mode by selecting the nucleus IDs from a list
NUCID	monitor specific nucleus IDs separately when running in local mode
OPTNS	access and edit report options
PH	purge history data from expanded list
PR	purge report definition
PRINT *[report-name]*	print report output or history data
PS	purge (started) report output
PT	purge target object definition
PU	purge user profile
QUIT	terminate Adabas Review session
RA *[report-name]*	reactivate suspended report
REFRESH *[report-name]*	refresh report
REGEN *[report-name]*	regenerate display program

Command	Use to...
RESET HISTORY FILE	unlock history file locked as a result of the abnormal termination of the history compression program
RF *[report-name]*	refresh report
RG *[report-name]*	regenerate display program
RULES	access and edit report processing rules
SAVE	save report definition; write to Adabas Review repository
SETfile	access different Adabas Review repositories
SORT	dynamically change sort options from view (VW) of started report results
STart*[report-name]*	start report
SU *[report-name]*	suspend a started report
SWitch *[report-name]*	switch CLOG data sets
TECH	displays environmental and maintenance information about the installed Adabas Review system
VIEW *[report-name]*	view started report, report output, or history data
VW *[report-name]*	view started report, report output, or history data
?	display help for a field

AA Command

Target objects are databases that may be monitored by Adabas Review. The AA (available Adabas nuclei) command is used to list the Adabas target objects for a particular supervisor call number (SVC) and provides a "snapshot" of processing activity as seen through Adabas Review.

The behavior of the AA command is different in BS2000 environments, compared to how it operates in z/OS and z/VSE environments. In BS2000 environments, this command will skips the Available SVCs screen and goes straight to the Available Targets screen because there is only one router available to you in BS2000.

For more information, see *Displaying SVC Lists and Target Objects* in the *Adabas Review Administration Guide*.

ACCPT Command

The `ACCPT` command is used within the `Edit Report` (`ER`) function to save changes temporarily while you are working on another portion of the report. The `ACCPT` command does not save changes to disk.

Enter the `ACCPT` command on the command line of the Report Options screen in the `Edit Report` function.

For more information, see various subsections of the section *Maintaining Standard Database and Client Reporting Reports* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

AH Command

The `AH` (available Adabas Review hubs) command is used to list the available Adabas Review hubs for a particular supervisor call number (SVC).

For more information, see *Displaying SVC Lists and Target Objects* in the *Adabas Review Administration Guide*.

AOS or AO Command

Adabas Online System (AOS) is a selectable unit of Adabas that enables database administrators to monitor and change aspects of an Adabas database interactively. For more information, refer to the *Adabas DBA Tasks Manual* documentation provided with your Adabas installation.

If Adabas Online System is installed on your system and you have access privileges to it, you can access it by entering the `AOS` command on the command line of any Adabas Review screen. For more information, see the section *Accessing Adabas Online System (AOS) from SYSREVDB* , in the *Adabas Review Concepts Manual*.

CD Command

Each report collects data from a particular database. The `CD` command is used within the `List Report Definitions` (`LR`) function to change that database; that is, to change the DBID. The `CD` command is issued from the Report Definitions screen. Specify a valid database ID or the word "ALL" to trigger a DBID=ALL report.

In hub mode, a DBID=ALL report collects data from all databases running on the same SVC as the hub (the databases must have been started with the ADARUN REVIEW parameter set to a hub ID). You can specify DBID=ALL for user-defined reports and for most of the predefined Adabas Review reports except for the Buffer Pool reports, the Pulse reports, and the Cluster Services reports. In local mode, a DBID=ALL report collects data only from the local database.

For more information, see the section *Changing the DBID* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

CH Command

The `CH` (compress history) command summarizes all history report occurrences within a date range into a single report occurrence. The original report occurrences are then purged. Although this command can dramatically reduce the number of records used to represent the report, it also denies you the possibility of thereafter viewing the data by different data ranges.

If the `CH` command terminates abnormally for any reason, the original history data could be lost; therefore, Software AG recommends backing up your data before executing this command. If an abnormal termination occurs, the history file is locked against further compression attempts for any report by any used. See the `RESET HISTORY FILE` command for information about unlocking the history file.

For more information, see the section *Compressing Accumulated History Report Data* in *Managing History Data*, in the *Adabas Review User's Guide*.

CL Command

The `CL` command is used within the `List Started Reports` (`LS`) function to close a report. Closing a report means that the report is suspended, and the accumulated data is written to the output locations defined to the report. Data accumulated by the report before the command was issued may not be viewed online after the command completes.

If the report option RESTART=Y is specified, the report is restarted automatically after the `CL` command has been issued.

On the Started Reports screen, enter the `CL` command on the selection line preceding the name of the report you are closing.

For more information, refer to the section *Closing Reports* in *Running Reports*, in the *Adabas Review User's Guide*.

COLOR Command

If you use a color terminal, the `COLOR` command may be used throughout Adabas Review to change the display from color to monochrome. `COLOR OFF` turns off the color display, and `COLOR ON` (the default) turns on the color display.

CONVERT HISTORY Command

If required, you can use the CONVERT HISTORY command to convert your history data from one release of Adabas Review to another. Some releases of Adabas Review may require this to bring your older history data in sync with any new report data you will generate.

Caution: You should not run this command unless required by a given Adabas Review release; in different releases of Adabas Review this command may alter entirely different data (or none at all). To determine whether it is necessary to convert your history data for a given release and what data this command will alter, read the Release Notes for the release and the installation instructions. When you are required to run this command, you should run it only once, before you run any new reports with the new Adabas Review release. If you run it more than once, you run the risk of altering your history data more than necessary, rendering it unusable. If you run it after you have run new reports with the new Adabas Review release, you run the risk of altering the data in the new reports.

When you run the CONVERT HISTORY command, a series of pop-up panels appear, prompting you for information. For specific functionality of the CONVERT HISTORY report for any given release, read that release's Release Notes.

CM Command

The `CM` command allows you to manage the client reporting engine. Specifically, it allows you to turn the engine on or off.

You cannot run client reports unless the Adabas Review client engine is on. However, you can define client reports when the client engine is off.

For more information, see the section *Managing Client Reporting*, in the *Adabas Review Administration Guide*.

CP Command

The CP command is used within the List Report Definitions (LR) function to change the display program used by the report.

The CP command is entered on the selection line preceding the report name on the Report Definitions screen. The cursor is automatically placed on the display program name so that you may enter the name of the new display program.

The CP command may also be entered on the command line of any Adabas Review screen as follows:

```
CP report-name
```

A window appears giving the report name, the name of the current display program, and an input line for the name of the new display program.

For more information, see the section *Changing to a Different Display Program* in *Maintaining Display Programs*, in the *Adabas Review User's Guide*.

CR Command

One way to create new reports is to use the Copy Report Definition (CR) command within the List Report Definitions (LR) function. The CR command is issued from the Report Definitions screen.

The CR command allows you to copy a report definition either to another Adabas Review repository, or to the current Adabas Review repository under a new name.

For more information, see the section *Copying a Report Definition* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

DBID Command

The DBID command is used to change to another local Adabas Review or to another Adabas Review hub database. DBID functions as a synonym for the HUB command. The command may be entered on the command line of any screen . Specify the database ID number of the new local Adabas Review or the new hub database for *dbid*.

The message "DBID has been changed" indicates that the connection between the Adabas Review Natural code and the indicated Adabas Review hub has been successfully established.

If Adabas Review is unable to change to the database specified, or if the database specified is running an earlier version of Adabas Review, an error message is displayed describing the condition.

DD Command

The DD command is used to display selected information about a report including the identity of the user who saved it, its format (summary or detail), whether history data is collected for it; what control breaks are specified; what totals and what averages are specified.

For more information, see the section *Displaying Report Information* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

DL Command

Note: To use this command, Entire Connection is required.

The `DL` command is used to download to a personal computer the data accumulated by a started report. It may also be used to download history data.

The `DL` command may be issued from either the Started Reports (LS function) screen or the History Reports (LH function) screen by entering the command on the selection line preceding the report name.

The `DL` command may also be entered on the command line of any screen within Adabas Review as follows:

```
DL report-name
```

If the `DL` command is entered on the command line without a report name, the command applies to the report you last accessed.

After the command has been issued, Entire Connection prompts you for file and directory information. Entire Connection proceeds to download the report output to the file and directory specified.

For more information, see the section *Downloading Report Output* in *Managing Report Output*, in the *Adabas Review User's Guide*.

EB Command

A sample report called "Buffer Pool Report" is created when Adabas Review is installed. The `EB` command is used to create, edit, and start buffer pool reports for specific databases being monitored based on the provided sample report.

For more information, see the section *Maintaining Buffer Pool Reports* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

EC Command

The `EC` command is used to create and modify Adabas Review client reports. It may be issued from any of the list report function screens (Report Definitions, Started Reports, and Adabas History Reports) on the selection line preceding the report name.

The `EC` command may also be issued on the command line of any screen within Adabas Review. To edit an existing report, or to create a new report, enter the command as follows:

```
EC report-name
```

For more information, see the section *Maintaining Standard Database and Client Reporting Reports* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

EL Command

Pulse reports receive nucleus statistical data from Adabas on an interval basis. Adabas transmits a Pulse record to Adabas Review once for each interval period. With the EL command, a Pulse report can be defined and started.

For more information, see the section *Maintaining Adabas Pulse Reports* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

EP Command

The `EP` command is used to edit the Natural program that displays the report results online when the `VIEW` command is issued.

The `EP` command may be issued from any of the three list report function screens (Report Definitions, Started Reports, and Adabas History Reports) by entering the command on the selection line preceding the report name.

The command may also be issued on the command line of any screen in Adabas Review as follows:

```
EP report-name
```

For more information, refer to the section *Editing the Display Program* in *Maintaining Display Programs*, in the *Adabas Review User's Guide*.

ER Command

The `ER` command is used to create and modify regular Adabas Review database reports. It may be issued from any of the list report function screens (Report Definitions, Started Reports, and Adabas History Reports) on the selection line preceding the report name.

The `ER` command may also be issued on the command line of any screen within Adabas Review. To edit an existing report, or to create a new report, enter the command as follows:

```
ER report-name
```

For more information, see the section *Maintaining Standard Database and Client Reporting Reports* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

ES Command

The `ES` command is used to access the Specialty Report Types menu, which provides access to the buffer pool, pulse, client monitor, and cluster services reports. This menu also allows you to review client monitor management settings.

The `ES` command may also be issued on the command line of any screen within Adabas Review. To access the Specialty Report Types menu, enter the command as follows:

```
ES
```

ET Command

The ET command is used by Adabas Review administrators to edit target definitions. This command is issued by from the Target Definitions screen (LT function) by entering the command on the selection line preceding the target's DBID.

The ET command may also be issued on the command line of any screen within Adabas Review. To edit an existing target, or to add a new target, enter the command as follows:

```
ET target-number
```

For more information, see *Displaying SVC Lists and Target Objects* in the *Adabas Review Administration Guide*.

EU Command

The EU command is used by Adabas Review administrators to create and edit user profiles, either the DEFAULT profile or the profile for a particular user ID.

For more information, read *User Profile Access Rules*, *Creating a User Profile*, *Editing a User Profile* or *Copying a User Profile* in the *Adabas Review Administration Guide*.

EX Command

The EX command is used within the List History Reports (LH) function. It "expands" the Adabas History Reports screen to list the dates when history data was accumulated by the report. For more information, see the section *Expanding the List of History Reports* in *Managing History Data*, in the *Adabas Review User's Guide*.

The command is issued by entering the EX code on the selection line preceding the report name.

The EX command must be issued before attempting to purge history data.

EXIT Command

The EXIT command is used to terminate a function and return to the menu from which the function was called. This command is not to be confused with the MENU command, which terminates the function and returns to the Adabas Review main menu.

Note: When this command is entered on the Main Menu, the Adabas Review Natural user exit, **P-UEXIT3**, is run.

The EXIT command may be issued from any screen within Adabas Review. The command may be issued either by entering EXIT on the command line or by pressing PF3.

FIELD, FLDS or LF Command

{FIELD | FLDS | LF} [*field-type1 field-type2 ... ***]**

The `FIELD`, `FLDS`, or `LF` command is used within the `Edit Report` (`ER`) function to display the data fields that may be used in reports:

- The list of field categories is displayed by entering the `FIELD`, `FLDS`, or `LF` on the command line of any screen within the `Edit Report` (`ER`) function.
- The list of fields for a particular category is displayed by entering the `FIELD`, `FLDS`, or `LF` command followed by one or more of the following category codes:

`AC`	Adabas control block fields
`BU`	Adabas buffer fields
`IN`	Interval and time fields
`IO`	Adabas I/O fields
`NA`	Natural fields
`NU`	Adabas nucleus fields
`OP`	Operating system fields
`TP`	Fields used to monitor transaction processing

For more information, refer to the section *Specifying Field Names* in *Maintaining Standard Database and Client Reporting Reports*, in the *Adabas Review User's Guide*.

FIN or QUIT Command

The FIN or QUIT command is used to exit from Adabas Review. It may be issued from any screen in Adabas Review. If exiting from the Adabas Review main menu, you may also press PF12 or PF3 .

Note: When this command is entered on the Main Menu, the Adabas Review Natural user exit, **P-UEXIT2**, is run.

FLDS Command

See the FIELD command.

GENAUTO or GA Command

The GENAUTO command is used to regenerate the control statements used by Adabas Review for autostarted reports. The GENAUTO command obtains target database information from the List Target Definitions (LT) function for the INPUT statement. For more information, read *Autostarted Reports* in *Adabas Review Concepts Manual* .

Ordinarily, Adabas Review maintenance procedures eliminate the need for users to regenerate these statements. In exceptional circumstances (e.g., the PDS becomes too full and requires compressing), you may either use the GENAUTO command or code the parameters manually.

You can issue the command by entering GENAUTO or GA on the command line of any screen within Adabas Review. A message confirms that the parameter statements have been regenerated.

GENCARD or GC Command

The GENCARD command is used to generate batch parameter statements from one Adabas Review online report. The GENCARD command obtains target database information from theList Target Definitions (LT) function for the INPUT statement.

You can enter either GENCARD or GC on the command line of any screen within Adabas Review. A window appears, prompting you for the DD name of the output file and the report name. For more information, read *Generating Batch Report Parameters* in *Using Batch Facilities*, in the *Adabas Review User's Guide*. The batch report parameters generated by GENCARD can be copied to the RVUPARM data set and used as input to an Adabas Review batch job.

HC or PRINT Command

{HC | PRINT} [*report-name* **]**

Note: The hard copy facility of Natural must be installed for this command.

The `HC` or `PRINT` command is used to send report results to a hard copy printer. The command may be issued from the list of history reports or the list of started reports (`LH` or `LS` functions) by entering the command `HC` on the selection line preceding the report name.

The command may also be entered on the command line of any Adabas Review screen as:

```
HC report-name
```

If the `HC` or `PRINT` command is entered on the command line without a report name, the command is applied to the report you last accessed.

For more information, see the section *Printing Report Results* in *Managing Report Output*, in the *Adabas Review User's Guide*.

HELP Command and ? Command

The HELP command may be issued from any screen within Adabas Review to obtain online help for that screen. The command provides general information regarding systems and/or functions within Adabas Review.

You can obtain help for a particular screen by either entering the HELP command on the command line or pressing PF1.

You can obtain help for a particular input field on a screen by entering a ? on that field. If specific help for that field is not available, the general information supplied for the screen is displayed.

For more information, read *Using the Online Help System* in *Getting Started*, in *Adabas Review Concepts Manual*.

HUB Command

The `HUB` command is used to change the hub database for Adabas Review. It may be entered on the command line of any screen. Specify the database identification number of the new hub database for *`hubid`* or specify "AUTO".

If "AUTO" is specified, the value of the hub ID is determined from the SVC of the current Natural session. If only one hub is running under the current SVC, that hub ID is used; if multiple hubs are running on this SVC, a pop-up window appears allowing you to select the hub to use. Note that this function only displays the available Adabas Review hubs which run on the default SVC that is specified in the ADALNK routine. If you need to connect to a hub on a different SVC than the default SVC, use the HUB=*`hubid`* version of this command, specifying the corresponding *`hubid`*. Be aware that the SVC needs to be accessible from within your online environment (i.e. using the SVC table feature , the Com-plete DBSVC feature,or others).

The message "HUB has been changed" indicates that the connection between the Adabas Review Natural code and the indicated Adabas Review hub has been successfully established.

If Adabas Review is unable to change to the hub database specified, or if the hub database specified has a version of Adabas Review prior to the current version installed, an error message is displayed describing the condition.

IN Command

The `IN` command is used to display storage and processing information for active Adabas Review reports. It is not available in batch mode.

For more information, see the section *Displaying Active Report Information* in *Running Reports*, in the *Adabas Review User's Guide*.

LF Command

See the FIELD command.

LH Command

The LH command is used to list reports that have written history data to the Adabas Review repository. From this list, you can use commands to view, download to a PC, print, or purge history data. In addition, you can edit a report definition and its corresponding display program.

For more information, see the section *Listing History Reports* in *Managing History Data*in the *Adabas Review User's Guide*.

LOG Command

The LOG command is used in local mode only to dynamically determine (that is, without cycling the system) whether:

- Adabas Review commands are processed in Adabas Review; that is, whether the Adabas Review command processor includes commands issued by the Adabas Review online system in its reports.
- Adabas commands are processed by Adabas Review; that is, whether the Adabas Review command processor includes commands issued by Adabas in its reports.

Note: Changes made by the LOG command are only valid as long as Adabas is running, and are not stored in a file; therefore, the changes remain in effect until Adabas and Adabas Review are restarted.

To switch the value of one or more of these parameters dynamically

1 After the Review DB menu, type the LOG command on the command line and press ENTER.

The following window appears:

```
+--------------------------------------+
|                                      |
|         Review Dynamic Parms         |
|                                      |
|                                      |
|     Process Review Commands.. Y      |
|     Process Adabas Commands.. Y      |
|                                      |
|                                      |
| Enter-PF1---PF2---PF3---PF4---PF5--- |
|                   Exit        Update |
|                                      |
+--------------------------------------+
```

2 Overtype the current value of one or both parameters with the opposite value.

3 Press PF5 to implement the change; press PF3 to close the window. The change remains in effect until Adabas and Adabas Review are restarted.

LOGO Command

The LOGO command displays the Adabas Review Logo screen. The LOGO command may be issued on the command line of any Adabas Review screen.

LOGON Command

The LOGON command is used to exit Adabas Review and log on to the Natural library specified. Note that under Natural Security, your user ID must be defined to the library specified in order to log on to that library. It is not available in batch mode.

Note: When this command is entered on the Main Menu, the Adabas Review Natural user exit, **P-UEXIT2**, is run.

LR Command

The LR command is used to list all report definitions. From the list, you can use commands to maintain a report. Such commands are entered on the selection line preceding the name of the report in the list.

Optionally, you can specify the report name or partial report name you want the report definition list to scroll too. For example:

- Specifying LR IO SUMMARY BY RABN* will display the list of all report definitions, starting at the IO SUMMARY BY RABN report.
- Specifying LR IO* will display the list of all report definitions, starting with the first report with the name beginning with the word "IO". In this case, if both the IO COUNT BY HOUR and IO SUMMARY BY RABN reports are in the list, the list would start at the IO COUNT BY HOUR report.

Note: You must specify an asterisk at the end of the full or partial report name in the LR command.

For more information, see the section *Listing Report Definitions* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

LS Command

The LS command is used to list all reports that have been started. From the list, you can use commands to suspend, reactivate, close, and refresh a report. You can view, download to a PC, print, or purge report output. Additionally, you can edit a report definition or its corresponding display program.

Optionally, you can specify the report name or partial report name you want the started report list to scroll too. For example:

- Specifying LS IO SUMMARY BY RABN* will display the list of all started reports, starting with the IO SUMMARY BY RABN report.
- Specifying LS IO* will display the list of all started reports, starting with the first report with the name beginning with the word "IO". In this case, if both the IO COUNT BY HOUR and IO SUMMARY BY RABN reports are started, the list would start at the IO COUNT BY HOUR report.

Note: You must specify an asterisk at the end of the full or partial report name in the LS command.

For more information, see the section *Listing Started Reports* in *Running Reports*, in the *Adabas Review User's Guide*.

LT Command

The LT command is used to list the existing target definitions. From the resulting list, the Adabas Review administrator can use commands to edit or purge a target definition.

For more information, see *Displaying SVC Lists and Target Objects* in the *Adabas Review Administration Guide*.

LU Command

The LU command is used by Adabas Review administrators to list the user profiles that have been defined. For more information, read *Listing User Profile Definitions* in the *Adabas Review Administration Guide*.

MENU Command

The MENU command returns you to the Adabas Review main menu. It may be issued either by entering the command on the command line of any Adabas Review screen, or by pressing PF12.

MSG Command

MSG [*message-number* **]**

The MSG command displays detailed explanations of Adabas Review messages. It may be issued on the command line of any Adabas Review screen.

The MSG command may be entered with or without specifying a message number. If a message number is not specified, Adabas Review provides information about the last message displayed, unless you have changed the Adabas Review screen or performed a different Adabas Review function since the message was displayed. In this case, specifying the MSG command without a message number produces an error.

NAT Command

The NAT command is used to exit Adabas Review and return the user to the Natural NEXT prompt, or the Natural main menu, depending on how the system is configured. The NAT command is not available in batch mode.

NUCID Command

Adabas Review can monitor specific nucleus IDs separately when running in local mode through the NUCID command. The monitored Adabas nucleus must be a cluster nucleus (for example, you are running Adabas Cluster Services 7.4 or Adabas Parallel Services 7.4).

You can start the same report on each nucleus and then view them separately. To combine the data from a report that runs on multiple nuclei, you must create the report as a history report. The data from each nucleus will be combined only when viewing the history report.

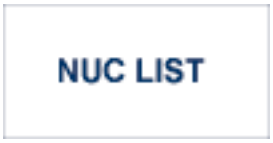
To access a specific nucleus, you must set the target NUCID in a similar manner as setting the target DBID. The target DBID is shown at the top right of each Adabas Review screen and the NUCID is shown at the top left of each screen. If you work in local mode on a cluster database without specifying a NUCID, you access one NUCID at random.

To set a specific NUCID, you may choose the NUCID from a list of available NUCIDs or enter it directly. To enter a NUCID directly, enter NUCID *nnnnn* in the Adabas Review command line, where *nnnnn* is the nucleus ID.

You can also set the NUCID to zero by entering NUCID in the Adabas Review command line. In this case, the NUCID indicator will be removed from the top left portion of the screen and all Adabas Review transactions will be to the NUCID selected by the Adabas command dispatcher.

If you want to select a nucleus from a list of nucleus IDs, read about the NUC LIST command.

NUC LIST Command



The functionality of this command is the same as that of the NUCID command, except that it allows you to select a nucleus ID from a list.

Adabas Review can monitor specific nucleus IDs separately when running in local mode through the NUC LIST command. The monitored Adabas nucleus must be a cluster nucleus (for example, you must be running Adabas Cluster Services or Adabas Parallel Services).

You can start the same report on each nucleus and then view them separately. To combine the data from a report that runs on multiple nuclei, you must create the report as a history report. The data from each nucleus will be combined only when viewing the history report.

To choose a nucleus ID from a list of active nucleus IDs, enter NUC LIST on the Adabas Review command line. Select a nucleus ID from the list by placing an X in the Sel column next to the nucleus ID and press PF5 to accept the selection.

OPTNS Command

Report options describe additional processing aspects of the report such as whether it is a detail or summary report; whether it will perform physical command logging; or whether the data it collects will be written to the Adabas Review repository and stored as history data.

The OPTNS command is used within the Edit Report Definitions (ER) function to set these report options, logging options, and history options.

For more information, see the section *Using the Report Options Screen* in *Maintaining Standard Database and Client Reporting Reports*, in the *Adabas Review User's Guide*.

PH Command

The PH command is used within the List History Report (LH) function to purge accumulated history data. This command is issued from the "expanded" Adabas History Reports screen; the EX command must be issued first.

The PH command is entered on the selection line preceding the report name on the expanded History Reports screen.

For more information, see the section *Purging Accumulated History Data* in *Managing History Data*, in the *Adabas Review User's Guide*.

PR Command

The PR command is used within the List Report Definitions (LR) function to purge reports. It is entered from the Report Definitions screen on the selection line preceding the report name.

For more information, see the section *Purging a Report Definition* in *Maintaining Report Definitions*, in the *Adabas Review User's Guide*.

PRINT Command

See the HC command.

PS Command

The PS command is used within the List Started Reports (LS) function to purge the data accumulated by a started report. The command is entered from the Started Reports screen on the selection line preceding the report name.

For more information, see the section *Purging Accumulated Data* in *Managing Report Output*, in the *Adabas Review User's Guide*.

PT Command

The `PT` command is used by Adabas Review administrators within the `List Target Definitions` (`LT`) function to purge target definitions. The command is issued from the Target Definitions screen on the selection line preceding the target's DBID.

For more information, read *Deleting a Target Definition* in the *Adabas Review Administration Guide*.

PU Command

The `PU` command is used by the Adabas Review administrator to delete a user profile. The command is issued from the list of user profiles on the selection line preceding the profile name.

For more information, refer to the section *Purging a User Profile* in the *Adabas Review Administration Guide*.

QUIT Command

See the `FIN` command.

Note: When this command is entered on the Main Menu, the Adabas Review Natural user exit, **P-UEXIT2**, is run.

RA Command

RA [*report-name*]

When you reactivate a suspended report, it resumes collecting data. The `RA` command is used to reactivate a suspended report. The command may be issued from the Started Reports (`LS` function) screen, and is entered on the selection line preceding the report name.

The command may also be entered on the command line of any screen within Adabas Review. If it is entered on the command line without a report name, Adabas Review attempts to reactivate the report you last accessed.

For more information, refer to the section *Reactivating Reports* in *Running Reports*, in the *Adabas Review User's Guide*.

REFRESH or RF Command

{REFRESH | RF} [*report-name*]

The REFRESH or RF command is used to refresh a started report. The REFRESH command purges the accumulated data and restarts the report.

When making changes to a started report, you are prompted to refresh the report when you attempt to start the report again. This is because the name of a report currently accumulating data matches the name of the report you are attempting to start; Adabas Review does not permit reports with duplicate names.

The RF command may be issued from the Started Reports (LS function) screen, and is entered on the selection line preceding the report name.

The RF or REFRESH command may also be entered on the command line of any screen within Adabas Review. If it is entered on the command line without a report name, the command is applied to the report you last accessed.

Because the REFRESH command executes a purge of the accumulated data, a window is displayed, prompting you to confirm the purge request.

For more information refer to the section *Refreshing Reports* in *Running Reports*, in the *Adabas Review User's Guide*.

REGEN or RG Command

{REGEN | RG} [*report-name* **]**

The `REGEN` or `RG` command is used to regenerate the display program that Adabas Review creates when a report is saved. These commands can be entered on the command line of any screen in Adabas Review. If they are entered on the command line without a report name, the command is applied to the report you last accessed.

You can regenerate the display programs for all reports by entering `REGEN ALL` or `RG ALL` on the command line of any SYSREVDB screen. A window will open that displays the name of each report as it is regenerated (see below). Do not press any keys during this process, as it will interrupt the process.

For more information, refer to the section *Regenerating a Display Program* in *Maintaining Display Programs*, in the *Adabas Review User's Guide*.

RESET HISTORY FILE Command

If you have used the `CH` command to compress accumulated history report data and the command processing terminates abnormally for any reason, the history file will be locked against further compression attempts for any report by any user.

To remove this lock, and to clean up any unusable compressed data, enter the following on the command line of the Adabas Review main menu:

```
RESET HISTORY FILE
```

If history records were lost as a result of the abnormal termination, the reset program will inform you of this. For more information, see the section *Compressing Accumulated History Report Data* in *Managing History Data*, in the *Adabas Review User's Guide*.

RF Command

See the REFRESH command.

RG Command

See the REGEN command.

RULES Command

Report processing rules determine how field values are selected for your report. These rules restrict the accumulated data to certain values or conditions.

The RULES command is used within the Edit Report Definitions (ER) function to specify and modify processing rules for a report.

For more information, see the section *Using the Report Processing Rules Screen* in *Maintaining Standard Database and Client Reporting Reports*, in the *Adabas Review User's Guide*.

SAVE Command

When a report definition is saved, it is written to the Adabas Review repository and a Natural display program is generated.

The SAVE command is used within the Edit Report Definitions (ER) function to write the report to the Adabas Review repository. To save a report, either enter the SAVE command on the command line of the Edit Report screen or press PF5.

For more information on saving report definitions, read *Saving a Report Definition* in the *Adabas Review User's Guide*.

SETFILE or SET Command

The SETFILE or SET command allows you to access a Adabas Review repository that is different from the one you are currently accessing.

The Adabas Review repository contains user profiles, report definitions, and history data. Depending on how Adabas Review is configured, you may have more than one Adabas Review repository.

The SETFILE or SET command may be issued from any Adabas Review screen, by entering the command on the command line.

A window is displayed, showing the DBID and FNR of the Adabas Review repository you are currently accessing. To change Adabas Review repositories, type the new DBID and FNR over the existing information and press ENTER.

If you enter the information correctly, you receive a message that the Adabas Review file was set successfully.

If you enter an incorrect DBID or FNR, you receive a message indicating the error, and the change is not made.

SORT Command

The SORT command is used after the VIEW command is issued to dynamically change the setting of the "Display By" report option. The following settings are available within the SORT command:

Setting	Sorts the data in . . .	Equivalent to "Display by ..."
Account (Ascend)	ascending order by control break;	SORTED
Number of commands	descending order by the "Number of Commands" column;	USAGE
First summary field	descending order by the first summary field in the report;	SUMFIELD
Account (Descend)	descending order by control break;	SORTEDDE
Date and Time	ascending order by the start date and time of the control break interval;	DATETIME
Physical Sequence	the physical sequence in which it was collected.	LINEAR

You may issue the SORT command by first issuing the VIEW or VW command to display the results of a started report.

On the command line, enter the SORT command or press PF2. A window is displayed, listing the settings. The current setting is indicated by an arrow (>).

You may change the sort setting by placing the cursor on the setting you want to use and pressing ENTER. The display of the report results changes according to the sort setting you select.

For more information, refer to the section *Using the SORT Command* in *Managing Report Output*, in the *Adabas Review User's Guide*.

START or ST Command

{START | ST} [*report-name***]**

A report must be started so that it can accumulate data. The `ST` or `START` command is used to start a report. It first executes the `SAVE` command to save the report definition and generate the display program. A started report can be suspended, reactivated, closed, or refreshed from the Started Reports screen (`LS` function).

The `ST` command may be issued from the Report Definitions (`LR` function) screen, by entering the command on the selection line preceding the report name.

The `ST` or `START` command may also be issued from any screen of Adabas Review. If it is issued without a report name, Adabas Review attempts to start the report you last accessed.

For more information on starting reports, read *Starting Reports* in the *Adabas Review User's Guide*.

Note: If you are trying to start a report in hub mode using batch Natural , you must issued the MENU HUB=*hubid* command prior to issuing the START command for the report.

SU Command

By suspending a started report, you stop it from accumulating any further data; however, the data already accumulated is retained. The RA (reactivate) command is used to reactivate a suspended report.

The SU command is used to suspend a started report. It may be issued from the Started Reports screen (LS function) by entering the command on the selection line preceding the report name.

The SU command may also be issued from any screen within Adabas Review. If it is issued without a report name, Adabas Review attempts to suspend the report you last accessed.

For more information, read *Suspending Reports* in *Running Reports*, in the *Adabas Review User's Guide*.

SWITCH or SW Command

{ SWITCH | SW } { LOG | SUM } [*report-name* **]**

The SW or SWITCH command is used to switch to the next command or summary log file defined for a specific report *before* the current log file is filled. This command is only valid for reports that have Adabas Review command logging or summary logging turned on.

If the maximum number of command or summary log files designated for the report is exceeded by this request, Adabas Review will begin writing over the file that contains the oldest data.

Note: This command does not switch the log file for any report other than the one selected.

The SW command may be issued from the Started Reports (LS function) screen by entering the command on the selection line preceding the report name.

The SW or SWITCH command may also be issued from any screen of Adabas Review. If it is issued without a report name, Adabas Review attempts to switch to the next log file for the report you accessed last.

For more information, read *Switching Log Files* in *Running Reports*, in the *Adabas Review User's Guide*.

TECH Command

The TECH command is used to display Adabas Review environmental and maintenance information. This function is useful in determining the environment in which Adabas Review is executing, and in determining which zaps have been applied.

For more information, read *Accessing Technical System Information* in *Getting Started*, in *Adabas Review Concepts Manual*.

VIEW or VW Command

The VIEW or VW command allows you to view results of a started report or the data accumulated by a history report. The VW command may be issued from any list function screen (Report Definitions, Started Reports, or Adabas History Reports) on the selection line preceding the report name.

More than one VW command can be issued from the Report Definitions or Started Reports screens to view multiple reports. For more information, read *Viewing Multiple Reports*, in the *Adabas Review User's Guide*.

Note: You cannot view multiple history reports. In other words, you cannot issue more than one VW command on the History Reports (LH) screen.

The VW or VIEW command may also be issued from any screen within Adabas Review. If it is issued without a report name, the command is applied to the report you last accessed.

For more information, refer to the section *Viewing Report Results* in *Managing Report Output*, in the *Adabas Review User's Guide*.

VW Command

See the VIEW command.

2 Field Reference

This part of the documentation describes the fields that may be used when creating Adabas Review reports using the Edit Report (ER) command.

Field Categories

The fields used in Adabas Review reports are grouped into the following categories:

Code	Category	Includes report fields . . .	Special Considerations
CB	Adabas Control Block Fields	that correspond to or are derived from Adabas control block fields.	—
CLOG	Adabas Command Log Fields	that are derived from the Adabas command log.	—
CMON	Client Reporting Fields	that are derived from client reporting log records.	—
BUF	Adabas Buffer Fields	that correspond to segments of the format, ISN, record, search, and value buffers.	When you specify a field from this category, Adabas Review automatically requires this information from the Adabas nucleus. This leads to more data to be sent from the Adabas nucleus to Adabas Review. **Note:** To limit the size of the transferred data the ADARUN REVLOGBMAX or REVLOGMAX parameters can be used. Missing data might also be associated with the setting of these parameters. If you are running Adabas Review in batch, the Adabas nucleus session that created the command log needs to run with the associated ADARUN parameter LOG*xx* parameter. For example, for FBSEG01 you need to specify LOGFB=YES.
IT	Interval and Time Fields	that establish intervals for control breaks. Fields in this category also display specific times for Adabas command processing.	—
I/O	Adabas I/O Fields	for analyzing the I/O operations that are performed against the Adabas Associator, Data Storage, and Work data sets.	When you specify a field from this category, Adabas Review automatically requires this information from the Adabas nucleus. This leads to more data to be sent from the Adabas nucleus

Code	Category	Includes report fields . . .	Special Considerations
			to Adabas Review and creates additional CPU overhead in the Adabas nucleus address space. If you are running Adabas Review in batch, the Adabas nucleus session that created the command log needs to run with the associated ADARUN parameter LOGIO=YES.
NAT	Natural Fields	for determining information about the Natural programs issuing Adabas calls.	When you specify a field from this category, you must also specify the Natural profile parameter ADAPRM=ON for your Natural user working environment. If you are running Adabas Review in batch, the Adabas nucleus session that created the command log needs to run with the associated ADARUN parameter LOGCLEX=YES.
NUC	Adabas Nucleus Fields	for analyzing Adabas nucleus information.	If you are running Adabas Review in batch, the Adabas nucleus session that created the command log needs to run with the associated ADARUN parameter LOGCLEX=YES.
OS	Operating System Fields	for displaying operating system-related information.	If you are running Adabas Review in batch, the Adabas nucleus session that created the command log needs to run with the associated ADARUN parameter LOGCLEX=YES.
TP	Transaction Processing Monitor Fields	for displaying information about the transaction processing monitor used with applications issuing Adabas calls.	If you are running Adabas Review in batch, the Adabas nucleus session that created the command log needs to run with the associated ADARUN parameter LOGCLEX=YES.
UF	User Fields	defined by the user that contain user-specified data for reporting.	A maximum of five Adabas Review user fields can be defined, with the names USERFLD1 through USERFLD5.

Notes:

1. References to an Adabas session pertain to a user's session with Adabas.. References to an Adabas nucleus session pertain to the duration that Adabas is active. When Natural utilities issue Adabas calls, the values of NATLIB, NATPROG, and NATSTMT do not denote user applications objects.
2. When a Natural object is invoked by means of a CALLNAT, PERFORM or FETCH statement, Natural may generate Adabas calls to load the invoked programming object into the buffer pool. In such a situation, the value of may be incorrect. Ignore Adabas calls to FNAT and FUSER to avoid misinterpretation of the value.

3. When a program is executed by means of the RUN command, the values of NATLIB, NATPROG and NATSTMT may be incorrect, because it is e.g. possible to RUN a nameless object from within the Natural program editor. Use the EXECUTE command to obtain correct values When a Natural programming object contains copy codes, NATSTMT may contain the line number within a copy code.

Alphabetic Listing

The following alphabetic listing of all reporting fields also indicates the category, field length, and the format (B=binary, C=alphanumeric, and T=the first four bytes of store clock value) of each field.

Note: Descriptions of each field can be found in the category field listings. Click on the category name in the following tables to find the description of the field.

A	C	E	G	I	L	N	P	R	T	V	Y
B	D	F	H	J	M	O	Q	S	U	W	Number

-A-

Field System Name	Category	Field Length	Format	Alternate Names	Description
ABALLOC	NUC	4	B	—	The number of bytes of attached buffer space currently used. An attached buffer is an internal buffer used for interregion communication.
ABDATE	NUC	8	C	—	The date (in YYYY-MM-DD format) when the attached buffer high-water mark was reached.
ABENT	NUC	4	B	—	The current number of attached buffer entries.
ABPCT	NUC	4	B	—	The maximum percentage of attached buffer space used during the Adabas nucleus session.
ABSIZE	NUC	4	B	—	The total amount (in bytes) of attached buffer space allocated at Adabas nucleus startup.
ABTIME	NUC	8	C	—	The time (in HH:MM:SS format) that the attached buffer high-water mark was reached.
ABUSED	NUC	4	B	—	The maximum number (in bytes) of attached buffer space used during the Adabas nucleus session.
ACBUSER	CB	4	B	—	This field, comprising the last four bytes of the ACB, contains user data that is passed with the Adabas call. It is referred to as the user area field in the ACB, and is neither used nor modified by Adabas.

Field System Name	Category	Field Length	Format	Alternate Names	Description
ACCTINF2	OS	16	C	—	Accounting information about the user that issued the Adabas call for z/OS batch jobs. This field will contain the second value specified in the account field of the job card.
ACCTINFO	OS	16	C	—	Accounting information about the user that issued the Adabas call. For z/OS batch jobs, the field will contain the first value specified in the account field of the job card. For Com-plete users, the field will contain the account information specified in the user's Com-plete profile.
ACINAME	TP	8	C	CURENPGM	The program name of the Adabas CICS link routine for the DCI interface: ADADCI.
ADADURA	IT	4	B	—	Adabas duration. Corresponds to the DURATION field. This field contains the amount of time (in seconds) that the command spent in the Adabas thread, including the time spent waiting for the completion of I/O operations. The ADADURA field differs from the DURATION and ORGDURA fields in that the time is computed to 6 decimal places instead of 4 decimal places.
AD1	CB	8	B	ADD1 ADDIT1	Alternate name for ADDIT1.
AD2	CB	4	B	ADD2 ADDIT2	Alternate name for ADDIT2.
AD3	CB	8	B	ADD3 ADDIT3	Alternate name for ADDIT3.
AD4	CB	8	B	ADD4 ADDIT4	Alternate name for ADDIT4.
AD5	CB	8	B	ADD5 ADDIT5	Alternate name for ADDIT5.
ADD1	CB	8	B	AD1 ADDIT1	This name is used in the schema portion of the summary record. It is an alternate name for ADDIT1.
ADD2	CB	4	B	AD2 ADDIT2	This name is used in the schema portion of the summary record. It is an alternate name for ADDIT2.
ADD3	CB	8	B	AD3 ADDIT3	This name is used in the schema portion of the summary record. It is an alternate name for ADDIT3.

Field System Name	Category	Field Length	Format	Alternate Names	Description
ADD4	CB	8	B	AD4 ADDIT4	This name is used in the schema portion of the summary record. It is an alternate name for ADDIT4.
ADD5	CB	8	B	AD5 ADDIT5	This name is used in the schema portion of the summary record. It is an alternate name for ADDIT5.
ADDIT1	CB	8	B	ADD1 (used in summary record) AD1	Corresponds to the ACB field `additions 1`. The command to be executed determines whether this field is used and what the contents represent.
ADDIT2	CB	4	B	ADD2 (used in summary record) AD2	Corresponds to the ACB field `additions 2`. The command to be executed determines whether this field is used and what the contents represent. When ADARUN parameter CLOGLAYOUT is set to 8, the content of this field is taken from the ACBX structure. Note that there are differences in meaning of the Additions 2 field in the ACBX and in the ACB. In the ACBX, some information that was formally available in the Additions 2 field is now split into several fields. For example, the error-related subcode information that was originally provided in the Additions 2 in the ACB is now provided in the Adabas ACBXSUBS (Subcomponent Response Subcode) field. The Additions 2 field will contain the transaction sequence number for an OP (open) and RE (read ET data) command. In Adabas Review, if the ADARUN parameter CLOGLAYOUT is set to 8, you will find the information from the older ACB Additions 2 structure in the following separate Adabas Review fields: ■ CMPRECL contains the compressed record length. ■ ERRFLDNM contains the error field name. ■ RSPSUB contains the subcode for an Adabas response code. ■ UCMPRECL contains the uncompressed record length.
ADDIT3	CB	8	B	ADD3 (used in summary record) AD3	Corresponds to the ACB field `additions 3`. The command to be executed determines whether this field is used and what the contents represent.

Field System Name	Category	Field Length	Format	Alternate Names	Description
ADDIT4	CB	8	B	ADD4 (used in summary record) AD4	Corresponds to the ACB field `additions 4`. The command to be executed determines whether this field is used and what the contents represent.
ADDIT5	CB	8	B	ADD5 (used in summary record) AD5	Corresponds to the ACB field `additions 5`. The command to be executed determines whether this field is used and what the contents represent.
ASSOIO	CLOG	2	B	ASSO-IO	The number of asynchronous Associator read I/Os for this command.
ASSO-IO	CLOG	2	B	ASSOIO	Alternate name for ASSOIO.
ASSOREAD	I/O	4	B	----	Associator read. The total number of Associator read I/Os that occurred during the Adabas session. This value is updated every minute and not when each command is issued.
ASSOWRIT	I/O	4	B	—	Associator write. The total number of Associator write I/Os that occurred during the Adabas session. This value is updated every minute and not when each command is issued.

-B-

Field System Name	Category	Field Length	Format	Alternate Names	Description
BUFFEFF	NUC	4	B	—	Buffer efficiency. Contains the ratio of the number of calls to the Adabas buffer pool manager to the number of Adabas physical read requests made to the Associator and the Data Storage devices. For example, if the number of read I/Os is 100 and the number of calls to the buffer pool manager is 500, the buffer efficiency is 500/100 or 5. The higher the buffer efficiency number, the more efficient is the use of buffer space. If the buffer efficiency number is low, it is recommended that you increase the LBP (length of buffer pool) ADARUN parameter.
BUFFLUSH	NUC	4	B	—	The number of times that the Adabas buffer pool (LBP) was flushed during the Adabas nucleus session.
BUFFWAIT	NUC	4	B	—	The number of times that Adabas Review had to wait for a buffer.

-C-

Field System Name	Category	Field Length	Format	Alternate Names	Description
CALLPGM	TP	8	C	—	The program that executed the last EXEC CICS LINK or XCTL command. ■ In non-DCI situations, this is the program calling the Adabas CICS link routine via EXEC CICS LINK ■ In DCI interface situations (used by Natural), this is the name of the executing program if there was no previous EXEC CICS LINK or, if there was a previous EXEC CICS LINK, the name of the program that executed the last EXEC CICS LINK.
CALLTYPE	CLOG	8	C	—	Contains the type of the Adabas call that was issued. Possible values are: ■ "PHYSICAL": indicates a standard Adabas call ■ "REMOTE": indicates a call arriving via Entire Net-Work.
CDURA	CMON	8	B	—	The total client duration time. This is the total time (in seconds) in which the client waits for the command to be processed by the server and the time it takes the ADALNK portion of the client to retrieve the command results. CDURA is the sum of the CRCVDURA and CWRKDURA fields. Measurement for this field starts immediately after the command is passed to the server (when it is posted from the Adabas link routine to the Adabas address space and SVC-4 router processing is performed). Measurement stops when the client picks up the command result information from the server (performing SVC-16 router processing within the Adabas link routine).
CID	CB	8	C	—	Corresponds to the hexadecimal value of the ACB field `command ID`. This field serves important functions, determined by the command, during command execution. For example, during a sequential read, the command ID is used to return the records to the user in the proper sequence. This field displays the value of the CID in hexadecimal format (for example, if CID=ABCD, it is displayed in this field as "C1C2C3C4").

Field System Name	Category	Field Length	Format	Alternate Names	Description
CIDALPHA	CB	4	C	—	Corresponds to the alphanumeric value of the ACB field `command ID`. This field serves important functions, determined by the command, during command execution. For example, during a sequential read, the command ID is used to return the records to the user in the proper sequence. This field displays the value of the CID in alphanumeric format.
CMD	CB	2	C	COMMAND	Corresponds to the ACB field `command code`.
CMDNAME	CB	14	C	CNAME	A translation of the 2-byte Adabas command code to a 14-byte string. For example, the command code BT is translated to "Backout Trans".
CMDRESP	CB	4	B	CMDRSP MCR	The time, in milliseconds, required to process the Adabas call. In the command table, Adabas Review stores the minimum Adabas duration for each command type returning a zero response code. The command table is updated whenever a lower duration value is encountered. Command response time is thus based on the `command time` field in the Adabas command log. The values for CMDRESP in the history file are automatically stored in seconds. To display them correctly, they must be converted to milliseconds. For more information on this conversion, read *Migration from Previous Versions* , in the *Adabas Review Release Notes*. If you need to continue using the old scale and the old calculation algorithm for history data, contact your Software AG support representative. Due to changes in the display programs in SYSREVDB, you cannot use SYSREVDB in Adabas Review 4.4 (or earlier versions) to display the field contents of CMDRESP correctly, unless you stay with the old scale and algorithm.
CMDRSP	CB	4	B	CMDRESP MCR	Alternate name for CMDRESP.
CMDSTAT	CB	8	C	—	Contains the Adabas internal status for an Adabas command. For example, the Adabas command L3 has an internal status of SIMPLE and S1 has an internal status of COMPLEX.
CMDTYPE	CLOG	1	B	TYPECMD CMD-TYPE	The 1-byte `command type` field of the Adabas command log record that describes the internal Adabas status for the command. For example, a

Field System Name	Category	Field Length	Format	Alternate Names	Description
					command type of 01 is a simple command and a command type of 42 is a complex command. The CMDSTAT field provides this translation.
CMD-TYPE	CLOG	1	B	CMDTYPE TYPECMD	Alternate name for CMDTYPE.
CMPRECL	CB	2	B	—	Contains the compressed record length of the record returned by a `READ` or a `FIND` command.
CNAME	CB	14	C	CMDNAME	Alternate name for CMDNAME.
COMMAND	CB	2	C	CMD	Alternate name for CMD.
COMMANDS	CB	8	B	—	The number of Adabas commands processed for the control break.
COP1	CB	1	C	OP1	Corresponds to the ACB field `command option 1`. The contents of this field is determined by the command being issued.
COP2	CB	1	C	OP2	Corresponds to the ACB field `command option 2`. The contents of this field is determined by the command being issued.
CPUID	OS	8	B	—	The internal identifying serial number of the CPU from which the Adabas call was issued. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter `ADAMODE=0` (the default value is 2).
CQALLOC	NUC	4	B	—	The number of bytes of command queue space currently used.
CQDATE	NUC	8	C	—	The date (in YYYY-MM-DD format) when the command queue high-water mark was reached.
CQDURA	IT	4	B	—	Command queue duration. Contains the amount of time (in seconds) that a command waited in the command queue before being dispatched into an Adabas thread.
CQENT	NUC	4	B	—	The current number of command queue entries.
CQEUID	TP	28	B	—	Contains the 28-byte Adabas communication user ID for the user who issued the Adabas call. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter `ADAMODE=0` (the default value is 2).

Field System Name	Category	Field Length	Format	Alternate Names	Description
CQJOB	NUC	8	C	—	The job or started task name for the user obtained from the user's command queue element.
CQMAXENT	NUC	4	B	—	The maximum number of entries that have been in the command queue for the Adabas nucleus session.
CQPCT	NUC	4	B	—	The maximum percentage of command queue space used during the Adabas nucleus session.
CQSIZE	NUC	4	B	—	The total number of bytes of command queue space allocated at Adabas nucleus startup.
CQTIME	NUC	8	B	—	The time (in HH:MM:SS format) when the command queue high-water mark was reached.
CQUQADDR	NUC	8	B	—	The address of the User Queue Element found in the CQE.
CQUSED	NUC	4	B	—	The maximum number of bytes of command queue space used during the Adabas nucleus session.
CRCVDURA	CMON	8	B	—	The client receive time. This is the time (in seconds) it takes the Adabas link routine to retrieve a processed command from the server. Measurement for this field starts immediately after the server posts the Adabas link routine to retrieve the command result information (performing SVC-12 router processing) . Measurement stops when the Adabas link routine retrieves the command information from the server address space (performing SVC-16 router processing).
CURENPGM	TP	8	C	ACINAME	Alternate name for ACINAME.
CWRKDURA	CMON	8	B	—	The client wait time, or the time in which the server works for the client. This is the time (in seconds) in which the client waits for the command to be processed by the server. Measurement for this field starts immediately after the command is passed to the server for processing (when it is posted from the Adabas link routine to the Adabas address space and SVC-4 processing is performed). Measurement stops when the Adabas link routine retrieves the command information from the server address space (performing SVC-12 router processing).

-D-

Field System Name	Category	Field Length	Format	Alternate Names	Description
DATAIO	CLOG	2	B	DATA-IO	The number of asynchronous Data Storage read I/Os for this command.
DATA-IO	CLOG	2	B	DATAIO	Alternate name for DATAIO.
DATAREAD	I/O	4	B	—	The total number of Adabas Data Storage read I/Os for the Adabas session. This value is updated every minute and not when each command is issued.
DATAWRIT	I/O	4	B	—	The total number of Adabas Data Storage write I/Os for the Adabas session. This value is updated every minute and not when each command is issued.
DATE	IT	8	C	—	The date (in YYYY-MM-DD format) when the Adabas command was processed.
DAY	IT	1	B	—	The day number (within a month) when the Adabas command was processed.
DBID	CB	2	B	—	The unique Adabas database identification number.
DBNAME	NUC	16	C	—	The 16-character name assigned to the database when it was created.
DES	CLOG	2	B	DESUPD	Alternate name for DESUPD.
DESUPD	CLOG	2	B	DES	Contains the number of descriptors that were updated for an Adabas call.
DUR	CLOG	4	B	DURATION DURAT	Alternate name for DURATION.
DURAT	CLOG	4	B	DURATION DUR	Alternate name for DURATION.
DURATION	CLOG	4	B	DURAT DUR	The amount of time that the command spent in the Adabas thread, including time spent waiting for I/O operations to complete. This field is expressed in seconds and is accurate to 4 decimal places. The field ADADURA contains the same value accurate to 6 decimal places.

-E-

Field System Name	Category	Field Length	Format	Alternate Names	Description
ENDDATE	IT	4	T	—	The date (in YYYY-MM-DD format) when the last Adabas command was processed within the current report control break.
ENDTIME	IT	4	T	—	The time (in 24-hour format) when the last Adabas command was processed within the current report control break.
ERRFLDNM	CB	2	C	—	Error field name. Contains the Adabas 2-character name for a field that has been found to be in error in the Adabas format or search buffer.
ESTCPU	IT	6.6	N	---	The estimated CPU time used by each Adabas command. The values shown in this field are only relative approximations of the CPU time used; they are not based on any actual CPU times and are calculated, instead, based on an algorithm. The algorithm used varies for each Adabas command type and is based on the number of instructions, I/Os, descriptors, and fields used. This field can be used as a SUM, MIN, MAX and/or AVG field.
ETID	TP	8	C	—	The Adabas ET (end transaction) ID that was established during the OP (open) call to Adabas. The contents of the field is determined by the calling program. If the first character provided for the ETID is smaller than "A" through "9", Adabas Review will show null value (blanks) in this field. If the first character is in the range "A" through "9", but the following characters are nonprintable characters, Adabas Review will display them in alphanumeric format, which might result in blanks or special characters. To display this field in hexadecimal, an Adabas Review user field can be used.

-F-

Field System Name	Category	Field Length	Format	Alternate Names	Description
FB	BUF	32	C	—	The contents of the Adabas format buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole format buffer is displayed.

Field System Name	Category	Field Length	Format	Alternate Names	Description
					The FBSEG*nn* field may be used to display parts of the format buffer if it is more than 32 bytes long. Only one FBSEG*nn* field is allowed for each report.
FBFIELDS	**BUF**	2	C	FBF	Format buffer fields. Contains the Adabas 2-character name for each field contained in the Adabas format buffer. This field can only be used in Summary reports.
FBL	**BUF**	2	B	—	Corresponds to the ACB field `format buffer length`. The contents of this field is determined by the Adabas command issued.
FBSEG*nn*	**BUF**	64	C	—	Represents a format buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `FBSEG01` you obtain the first 64 bytes of the format buffer. The segment number may be a value between 01 and 32, inclusive. The field `FBSEGnn` is available for summary reports only; use the field FB for detail reports.
FILE	**CB**	2	B	FNR (used in **summary record**)	Corresponds to the ACB field `file number`. The function of this field is determined by the Adabas command being issued.
FILENAME	**NUC**	16	C	---	Contains the 16-character name assigned to the Adabas file, and is obtained from the Adabas file control block (FCB). If the file name is not available, the field contains "FCB-UNAVAILABLE".
FILETYPE	**NUC**	6	C	---	Contains the 6-character type assigned to the Adabas file. This field contains the string "USER" if the file is a user file or "SYSTEM" if the Adabas Checkpoint file was read or updated.
FNR	**CB**	2	B	FILE	This name is used in the schema portion of the **summary record**. It is an alternate name for FILE.
FORMATOW	**NUC**	4	B	---	The total number of Adabas internal format overwrites that have occurred during the Adabas nucleus session.
FORMATTR	**NUC**	4	B	---	The total number of Adabas internal format translations that have occurred during the Adabas nucleus session.
FULLSTCK	**IT**	8	T	---	The 8-byte store clock value taken when the Adabas command was processed.

-G-

Field System Name	Category	Field Length	Format	Alternate Names	Description
GLOBFMID	CB	8	B	---	Contains the global internal format buffer ID for the Adabas call within a sequence of Adabas calls. This field is derived from ADDIT5 field.

-H-

Field System Name	Category	Field Length	Format	Alternate Names	Description
HOLDISN	NUC	2	B	---	The numbers of ISNs which are in HOLD status by the user at the time this command is executed. The number is obtained after the execution of this command.
HOUR	IT	5	C	HR	The hour (in 24-hour format) when the Adabas command was processed.
HQDATE	NUC	8	C	---	The date (in YYYY-MM-DD format) that the hold queue high-water mark was reached.
HQENT	NUC	4	B	---	The current number of hold queue entries.
HQPCT	NUC	4	B	---	The maximum percentage of hold queue space used during the Adabas nucleus session.
HQSIZE	NUC	4	B	---	The total number of bytes allocated to the hold queue at Adabas nucleus startup.
HQTIME	NUC	8	C	---	The time (in HH:MM:SS format) that the hold queue high-water mark was reached.
HQUSED	NUC	4	B	---	The maximum number of bytes of hold queue space used during the Adabas nucleus session.
HQUSRENT	NUC	4	B	---	The number of hold queue user entries.
HR	IT	5	C	HOUR	Alternate name for HOUR.

-I-

Field System Name	Category	Field Length	Format	Alternate Names	Description
IB	BUF	32	C	---	The contents of the Adabas ISN buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole ISN buffer is displayed.

Field System Name	Category	Field Length	Format	Alternate Names	Description
					The IBSEG*nn* field may be used to display parts of the ISN buffer if it is more than 32 bytes long.
IBL	**BUF**	2	B	---	Corresponds to the ACB field `ISN buffer length`. The use of this field is determined by the command being issued.
IBSEG*nn*	**BUF**	64	C	---	Represents an ISN buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `IBSEG01`, you obtain the first 64 bytes of the ISN buffer. The segment number may be a value between 01 and 32, inclusive. The field `IBSEGnn` is available for summary reports only; use the field IB for detail reports.
IO	**I/O**	2	B	IOS	This name is used in the schema portion of the **summary record**. It is an alternate name for IOS.
IOS	**I/O**	2	B	IO (used in **summary record**)	The total number of I/Os for the command processed; it is the sum of `ASSOIO`, `DATAIO` and `WORKIO`.
IOCOMP	**I/O**	3	C	---	Identifies the Adabas component against which the I/O was issued. For example, if the I/O is issued against Data Storage extent 1, the field contains DS1. If the I/O is issued against address converter extent 3, the field contains AC3.
IOFUNC	**I/O**	5	C	---	The type of I/O operation performed against an Adabas component. The values for this field are "READ" or "WRITE".
IOLIST	**I/O**	10	C	---	The hexadecimal I/O list for a command obtained from the Adabas command log record. Four bytes are allocated for each I/O list entry.
IOPHYS	**I/O**	16	C	---	A translation of the I/O list entry from the Adabas command log record. The format for this field is `comp-x nnnnnn`, where: *comp* is the Adabas component (ASSO, DATA, or WORK) *x* is the type of I/O, ("R" for read or "W" for write) *nnnnnn* is the RABN (relative Adabas block number)
IORABN	**I/O**	8	C	---	The relative Adabas block number against which the I/O was performed.
IOTOCMD	**I/O**	4	B	---	The ratio of the total number of I/O operations performed to the total number of commands processed.
IOTYPE	**I/O**	4	C	---	Identifies the component against which the I/O operation was performed. Values for this field may be ASSO 'Associator', DATA 'Data Storage', or WORK 'Work data set'.

Field System Name	Category	Field Length	Format	Alternate Names	Description
IOVOLSER	I/O	6	C	---	Contains the volume serial number against which the I/O operation was performed. This field may be used to show Adabas I/O distribution. For WORK I/Os (see the IOTYPE field) the IOVOLSER field will contain the text "UNKNWN". If the data is obtained from blocks that are stored in the Adabas buffer pool and therefore no physical I/Os are made, this field will be empty.
ISN	CB	4	B	---	Corresponds to the ACB field `ISN`. The use of this field is determined by the command being issued.
ISNLL	CB	4	B	---	Corresponds to the ACB field `ISN lower limit`. The field contains the lowest ISN that Adabas returns when retrieving ISN lists. The use of this field is determined by the command being issued. **Note:** This field could be misinterpreted when used at the OP command, since the value of ISNLL as well as ISNQ are used for purposes other than the ISN lower limit or ISN quantity. Please refer to the Adabas Command Reference manual for further information.
ISNQ	CB	4	B	---	Corresponds to a modification of the ACB field `ISN quantity`. The field is modified based on command type, and is suitable for performing mathematical calculations such as SUM and AVERAGE. The unmodified data can be found in the ORGISNQ field. **Note:** This field could be misinterpreted when used at the OP command, since the value of ISNQ as well as ISNLL are used for purposes other than the ISN lower limit or ISN quantity. Please refer to the Adabas Command Reference manual for further information.

-J-

Field System Name	Category	Field Length	Format	Alternate Names	Description
JMREDATE	OS	10	C	---	The date (in YYYY-MM-DD format) when the batch job was entered in JES or from the job information macro.
JOB	OS	8	C	JOBNAME	Alternate name for JOBNAME.
JOBCLASS	OS	1	B	---	(z/OS only) The one-byte character of the CLASS parameter in the job card.

Field System Name	Category	Field Length	Format	Alternate Names	Description
JOBID	OS	8	C	---	A combination of the job identifier and the job number of the user who issued the Adabas call. This field is available under z/OS and z/VSE: ■ Under z/OS, the field will contain JOB, STC, or TSU as the job identifier followed by a 5-byte JES job number. ■ Under z/VSE, the field will contain JOB as the identifier, followed by the 5-byte POWER job number.
JOBNAME	OS	8	C	JOB	The name of the job or task from which the Adabas call was issued. This field is the contents of the JOBNAME from the Adabas command log record and may not reflect the actual JOBNAME of the task that issued the Adabas call.
JOBNUM	OS	5	C	---	The job number of the user who issued the Adabas call. This field is available under z/OS and z/VSE. The field will contain an alphanumeric, 5-byte value for the JES (z/OS) or POWER (z/VSE) job number.

-L-

Field System Name	Category	Field Length	Format	Alternate Names	Description
LEVEL	NAT	2	B	NATLEVEL	Alternate name for NATLEVEL.
LFPALLOC	NUC	4	B	---	The number of bytes currently used in the format pool.
LFPENT	NUC	4	B	---	The current number of entries in the format pool.
LFPMAX	NUC	4	B	---	The maximum number of bytes of format pool space used during the Adabas nucleus session.
LFPPCT	NUC	4	B	---	The maximum percentage of format pool space used during the Adabas nucleus session.
LFPSIZE	NUC	4	B	---	The total number of bytes allocated to the format pool at Adabas nucleus startup.
LFPUSED	NUC	4	B	---	The maximum number of bytes of format pool space used during the Adabas nucleus session.
LIB	NAT	8	C	NATLIB	Alternate name for NATLIB.
LOG	NAT	8	C	NATAPPL LOGON	This name is used in the schema portion of the **summary record**. It is an alternate name for NATAPPL.

Field System Name	Category	Field Length	Format	Alternate Names	Description
LOGON	NAT	8	C	NATAPPL LOG (used in summary record)	Alternate name for NATAPPL.
LPARNAME	OS	8	C	---	The system LPAR or partition name (in z/OS or z/VSE environments) or the environment name from the job information macro (in BS2000 environments).
LUNAME	OS	8	C	---	The VTAM LU (logical unit) name of the user who issued the Adabas call. If the TP system is Com-plete, the LUNAME field contains the Com-plete ID: ■ The first 3 bytes of the ID represent the Com-pass stack level ■ The fourth byte is the Com-plete patch character ■ The last 4 bytes identify the Com-plete terminal ID number in hexadecimal format. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter ADAMODE=0 (the default value is 2).
LWPALLOC	NUC	4	B	---	The number of bytes of the work pool currently in use.
LWPENT	NUC	4	B	---	The current number of work pool entries.
LWPMAX	NUC	4	B	---	The maximum number of bytes of work pool space used during the Adabas nucleus session.
LWPMXENT	NUC	4	B	---	The maximum number of work pool entries used during the Adabas nucleus session.
LWPPCT	NUC	4	B	---	The maximum percentage of work pool space used during the Adabas nucleus session.
LWPSIZE	NUC	4	B	---	The number of bytes that were allocated to the work pool at Adabas nucleus startup.
LWPUSED	NUC	4	B	---	The maximum number of bytes of work pool space used during the Adabas nucleus session.

-M-

Field System Name	Category	Field Length	Format	Alternate Names	Description
M15	IT	5	C	15M	Alternate name for 15M.
M5	IT	5	C	5M	Alternate name for 5M.
MCR	CB	4	B	CMDRESP CMDRSP	Alternate name for CMDRESP.
MIN	IT	5	C	1M MINUTE	Alternate name for 1M.
MINUTE	IT	5	C	1M MIN	Alternate name for 1M.
MO	IT	1	B	MONTH MON	Alternate name for MONTH.
MON	IT	1	B	MON MO	Alternate name for MONTH.
MONAME	IT	3	C	---	The name of the month when the Adabas command was processed.
MONTH	IT	1	B	MON MO	The number of the month when the Adabas command was processed.
MULTICNT	NUC	8	N	---	The number of multifetch records returned. For all read calls (L*x* commands), multifetch returns a group of records in the record buffer and a description of these records in either the caller's ISN buffer (for ACB interface direct calls) or the caller's multifetch buffer (for ACBX interface direct calls). Multifetch records are only returned if the ACB or ACBX call contain an <literalvalue>M</literalvalue> in Command Option 1.

-N-

Field System Name	Category	Field Length	Format	Alternate Names	Description
NATAPPL	NAT	8	C	LOGON LOG (used in summary record)	The Natural application name (or library) to which the user issued a LOGON. This field does not necessarily show the library of the Natural object from which the Adabas call is issued. Under SQL, this field contains the library name.
NATCLTID	NAT	8	C	---	NATCLTID displays the client user ID of a user using a Natural server. NATCLTID only contains a value if an RPC client request is executed in a Natural RPC server session. In all other cases the field is empty.
NATCOUNT	NAT	2	B	---	The total number of Adabas calls generated by the user application since the last terminal I/O.
NATEXEC	NAT	2	B	---	The number of times a Natural object that issues Adabas calls has been executed. NATEXEC is "1" if the Natural object has issued an Adabas call for the first time on this level; for each subsequent Adabas call on this level the value will be set to zero. You can use the SUM statement to total the values of this field to obtain the total number of times a specific Natural object has been called.
NATGRP	NAT	8	C	---	The current Natural security group to which the user belongs.
NATLEVEL	NAT	2	B	LEVEL	The Natural call level of the Natural program issuing the Adabas call. For example, a CALLNAT routine that is called from a program and issues an Adabas call has a Natural level of 2.
NATLIB	NAT	8	C	LIB	The name of the Natural library where the object is located that is currently executed.
NATPROG	NAT	8	C	PROGRAM PRO (used in summary record)	The name of the Natural program that issued the Adabas call. When Natural internally issues Adabas calls to load Natural objects, this value is not updated. Under SQL, this field contains the program name.
NATRPCID	NAT	16	C	---	The 16-byte alphanumeric value for the store clock value used as identification of the Natural RPC Server.
NATRPCCO	NAT	16	C	---	The 16-byte alphanumeric value of the conversation ID from the Natural RPC Server.
NATSTMT	NAT	4	C	---	The Natural statement number where the Adabas command is processed. This line number is the line in the Natural program displayed by NATPROG. When the processed Adabas command is in the copy code portion of the Natural program, the line number

Field System Name	Category	Field Length	Format	Alternate Names	Description
					refers to the copy code. The name of the copy code is not available at this time.
NATUID	NAT	8	C	---	The name of the Natural library to which the user is currently logged on. This is the value of the Natural system variable *APPLIC-ID.
NUCID	NUC	3	B	SMP (used in summary record)	The ID of an Adabas nucleus in an Adabas Parallel Services or Adabas Cluster Services environment.

-O-

Field System Name	Category	Field Length	Format	Alternate Names	Description
OP1	CB	1	C	COP1	Alternate name for COP1.
OP2	CB	1	C	COP2	Alternate name for COP2.
OPSYSID	OS	4	B	---	The operating system ID. The address of the ASCB (address space control block) for the job or task that issued the Adabas call. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter `ADAMODE=0` (the default value is 2).
OPSYSNAM	OS	8	C	---	The operating system name (SYSNAME) that is specified in the SYS1.PARMLIB and which will be obtained from the CVT (in z/OS environments) or the operating system name and version number (in BS2000 environments).
ORGDURA	CLOG	4	B	---	The (original) value of the "duration" field contained in the command log record. The time is expressed in units of 16 microseconds.

-P-

Field System Name	Category	Field Length	Format	Alternate Names	Description
PRI	CLOG	1	B	PRIORITY PRIO	Alternate name for PRIORITY.
PRIO	CLOG	1	B	PRIORITY PRI	Alternate name for PRIORITY.

Field System Name	Category	Field Length	Format	Alternate Names	Description
PRIORITY	CLOG	1	B	PRI PRIO	The operating system priority for the user issuing the Adabas call.
PRO	NAT	8	C	NATPROG PROGRAM	This name is used in the schema portion of the **summary record**. It is an alternate name for NATPROG.
PROGRAM	NAT	8	C	NATPROG PRO (used in **summary record**)	Alternate name for NATPROG.

-Q-

Field System Name	Category	Field Length	Format	Alternate Names	Description
QTR	IT	1	B	QUARTER QUAR	Alternate name for QUARTER.
QUAR	IT	1	B	QUARTER QTR	Alternate name for QUARTER.
QUARTER	IT	1	B	QUAR QTR	The quarter of the year in which the Adabas command was processed.

-R-

Field System Name	Category	Field Length	Format	Alternate Names	Description
RB	BUF	32	C	---	The contents of the Adabas record buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole record buffer is displayed. The RBSEG*nn* field may be used to display parts of the record buffer if it is more than 32 bytes long.
RBL	BUF	2	B	---	Corresponds to the ACB field `record buffer length`. The record buffer is used primarily with read, search, and update commands.
RBSEG*nn*	BUF	64	C	---	Represents a record buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `RBSEG01`, you obtain the first 64

Field System Name	Category	Field Length	Format	Alternate Names	Description
					bytes of the record buffer. The segment number may be a number between 01 and 32, inclusive. The field RBSEG*nn* is available for summary reports only; use the field RB for detail reports.
ROUTDURA	**OS**	8	B	ROUTTIME	The amount of time between the time a command was issued by the application and the time it was queued in the Adabas command queue. For Adabas 8.1 and earlier, this field is expressed in seconds; for Adabas 8.2 and later releases, this field is expressed in milliseconds.
ROUTTIME	**OS**	8	B	ROUTDURA	Alternate name for ROUTDURA.
RSP	**CB**	2	B		Corresponds to the ACB field `response code`. A response code of 0 indicates that the command executed successfully. This name is used in the schema portion of the **summary record**.
RSPSUB	**CB**	4	B	---	Contains the Adabas response code subcode from the ACB field `Additions 2` or the ACBX field `ACBXERRC` for certain nonzero Adabas response codes.

-S-

Field System Name	Category	Field Length	Format	Alternate Names	Description
SB	**BUF**	32	C	---	The contents of the Adabas search buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole search buffer is displayed. The SBSEG*nn* field may be used to display parts of the search buffer if it is more than 32 bytes long.
SBFIELDS	**BUF**	2	C	---	Search buffer fields. Contains the Adabas 2-character field name for each field contained in the Adabas search buffer. This field can only be used in Summary reports.
SBL	**BUF**	2	B	---	Corresponds to the ACB field `search buffer length`.
SBSEG*nn*	**BUF**	64	C	---	Represents a search buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `SBSEG01`, you obtain the first 64 bytes of the search buffer. The segment number may be a number between 01 and 32, inclusive. The field SBSEG*nn* is available for summary reports only; use the field SB for detail reports.

Field System Name	Category	Field Length	Format	Alternate Names	Description
SECGID	TP	8	C	---	Contains the security system group ID for the user who issued the Adabas call. This field is available under z/OS when the user is running with an external security system (RACF, ACF2, or Top Secret).
SECUID	TP	8	C	---	Contains the security system user ID for the user who issued the Adabas call. This field is available under z/OS when the user is running with an external security system (RACF, ACF2, or Top Secret).
SEQ	CLOG	4	B	SEQUENCE	Alternate name for SEQUENCE.
SEQUENCE	CLOG	4	B	SEQ	The Adabas command sequence number. The value is incremented by one for each Adabas command processed.
SMP	NUC	3	B	NUCID	This name is used in the schema portion of the **summary record**. It is an alternate name for NUCID.
SRCHTYPE	CLOG	8	C	---	The type of search or search algorithm. This field contains one of the following values if the Adabas command log is for version 8.2 SP2 or later: ■ ALGO-1: Search algorithm 1 was used. ■ ALGO-2: Search algorithm 2 was used. ■ ALGO-3: Search algorithm 3 was used. ■ ALGO-4: Search algorithm 4 was used. ■ MIXED: A nondescriptor search combined with a descriptor search was used. ■ NONDES: A nondescriptor search occurred. If the Adabas command log is for an older Adabas release (8.2 SP1 or earlier), the value of the SRCHTYPE field will be blank.
STEPNAME	OS	8	C	---	The name of the job step or task step that issued the Adabas call. This step is only available in z/OS environments.
STRTDATE	IT	4	T	---	The date (in YYYY-MM-DD format) when the first Adabas command was processed within the current report control break.
STRTTIME	IT	4	T	---	The time (in 24-hour format) when the first Adabas command was processed within the current report control break.
SVC	NUC	1	B	---	The Adabas SVC (supervisor call) number used for interregion communication between the user's address space and the Adabas nucleus address space.

Field System Name	Category	Field Length	Format	Alternate Names	Description
SYSCMD	NUC	4	B	---	The number of Adabas system commands that have been executed. Adabas system commands execute in Adabas threads 0 and -1.

-T-

Field System Name	Category	Field Length	Format	Alternate Names	Description
THD	CLOG	1	B	THREAD	Alternate name for THREAD.
THDNUM	NUC	4	B	---	The number of 8K Adabas threads in the nucleus. The number includes the two Adabas system threads (threads 0 and -1).
THDURA	CB	8	B	THTIME	The active thread time for a command. This is the time, in milliseconds, required to process the Adabas call, not including the wait time caused by I/O or other required resources. The value of this field is obtained from the command time field in the Adabas command log (LOX1CTME).
THREAD	CLOG	1	B	THD	The Adabas thread number in which the Adabas command was processed.
THREADSW	NUC	4	B	---	The number of thread switches that have occurred during the Adabas nucleus session.
THROWBKS	NUC	4	B	---	The number of command throwbacks that have occurred during the Adabas nucleus session. Throwbacks occur when the record you wish to retrieve has been placed on hold by another user. The command you issued is placed on the command queue ("thrown back") for reprocessing.
THTIME	CB	8	B	THDURA	Alternate name for THDURA.
TIALLOC	NUC	4	B	---	The number of bytes of LI (ISN list table) space currently used.
TID	TP	2	B	---	The Com-plete terminal ID number of the user who issued the Adabas call.
TIDATE	NUC	8	C	---	The date (in YYYY-MM-DD format) when the LI (ISN list table) high-water mark was reached.
TIENT	NUC	4	B	---	The current number of entries used in the LI (ISN list table).
TIME	IT	8	C	---	The time (in 24-hour format) when the first Adabas call was processed.
TIPCT	NUC	4	B	---	The maximum percentage of LI (ISN list table) space used during the Adabas nucleus session.

Field System Name	Category	Field Length	Format	Alternate Names	Description
TISIZE	NUC	4	B	---	The number of bytes allocated to the LI (ISN list table) at Adabas nucleus startup.
TITIME	NUC	8	C	---	The time (in HH:MM:SS format) that the LI (ISN list table) high-water mark was reached.
TIUSED	NUC	4	B	---	The maximum number of bytes of LI (ISN list table) space used during the Adabas nucleus session.
TOTALCMD	NUC	4	B	---	The total number of Adabas system and user commands that have been processed during the Adabas nucleus session.
TOTALIOS	I/O	4	B	---	Contains the total number of I/Os performed against all Adabas components for the Adabas session; the sum of ASSOREAD, ASSOWRIT, DATAREAD, DATAWRIT, WORKREAD, and WORKWRIT. This value is updated every minute and not when each command is issued.
TOTDURA	IT	4	B	---	Total duration. Contains the amount of time the command was in the Adabas thread plus the amount of time the command waited in the command queue. The TOTDURA field is the sum of the ADADURA and CQDURA field values expressed in seconds.
TPTRANCT	TP	4	B	---	A transaction count field. Possible values for this field are either "1" or "0" (zero). A transaction is started with a TP terminal read and completed with a TP terminal write. For the first command of a transaction by a user, this field is set to "1". For all subsequent calls of the same transaction for the same user, this field is set to "0". This field is most useful as a SUM field in conjunction with the field TRANSID. Used in this manner, you can determine the work rate per transaction.
TPTRANNM	TP	4	B	---	The transaction number as established by the user's TP system for the transaction that issued the Adabas call.
TPUSER	TP	8	C	TPUSERID	Alternate name for TPUSERID.
TPUSERID	TP	8	C	TPUSER	The user ID on the TP monitor from which the Adabas call was issued.
TRANSID	TP	8	C	---	The name of the root transaction or program that issued the Adabas call.
TRUENAME	TP	8	C	---	The name of the Adabas CICS link routine TRUE exit.

Field System Name	Category	Field Length	Format	Alternate Names	Description
TSALLOC	NUC	4	B	---	The number of bytes in the LQ (table of sequential commands) currently being used.
TSDATE	NUC	8	C	---	The date (in YYYY-MM-DD format) when the LQ (table of sequential commands) high-water mark was reached.
TSENT	NUC	4	B	---	The current number of entries in the LQ (table of sequential commands).
TSPCT	NUC	4	B	---	The maximum percentage of LQ (table of sequential commands) space used during the Adabas nucleus session.
TSSIZE	NUC	4	B	---	The number of bytes allocated to the LQ (table of sequential commands) at Adabas nucleus startup.
TSTIME	NUC	8	C	---	The time (in HH:MM:SS format) when the LQ (table of sequential commands) high-water mark was reached.
TSUSED	NUC	4	B	---	The maximum number of bytes used in the LQ (table of sequential commands) during the Adabas nucleus session.
TYPECMD	CLOG	1	B	CMDTYPE CMD-TYPE	Alternate name for CMDTYPE.

-U-

Field System Name	Category	Field Length	Format	Alternate Names	Description
UBUID	TP	8	C	---	Contains the last 8 bytes of the 28-byte Adabas communication ID (CQEUID) for the user who issued the Adabas call. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter ADAMODE=0 (the default value is 2).
UCMPRECL	CB	2	B	---	Uncompressed record length. The uncompressed length of the Adabas format or search buffer field.
UOWID	TP	8	C	---	Contains the instance number and the sequence number of the CICS field `NETUOWID`, which is 27 bytes long. This field can only be filled in by CICS. The evaluation of this field requires a large amount of CPU time and, therefore, can only be activated by

Field System Name	Category	Field Length	Format	Alternate Names	Description
					a special zap. Following is a description of the bytes in NETUOWID: ■ Offset 0 (Length 1): The length (L) of the Logical-Unit-of-Work-Identifier-Field, not including this field. The NETUOWID contains Logical-Unit-of-Work-Identifier-Field plus padding bytes. Values: 0 or 10 < = L < = 26. ■ Offset 1 (Length 1): The length of Network Name, not including this field, m = L - 9 , 1 < = m < = 17. ■ Offset 2 (Length m): Network name, format: ABCDEFGH.ABCDEFGH, Networkid.Luname. ■ Offset m + 2 (Length 6): Instance number. ■ Offset m + 2 + 6 (Length 2): Sequence number. ■ Offset m + 2 + 6 + 2 (Length until 27): Residual data.
UQALLOC	NUC	4	B	---	The number of bytes of user queue space currently in use.
UQDATE	NUC	8	C	---	The date (in YYYY-MM-DD) format when the user queue high-water mark was reached.
UQENT	NUC	4	B	---	The current number of user queue entries.
UQPCT	NUC	4	B	---	The maximum percentage of user queue space used during the Adabas nucleus session.
UQSIZE	NUC	4	B	---	The number of bytes allocated to the user queue at Adabas nucleus startup.
UQTIME	NUC	8	C	---	The time (in HH:MM:SS format) when the user queue high-water mark was reached.
UQUID	TP	4	B	---	Contains the unique 4-byte UQE (user queue element) user ID for the user who issued the Adabas call. This value is allocated in numerically ascending sequence for each UQE allocated by the Adabas nucleus.
UQUSED	NUC	4	B	---	The maximum number of bytes of user queue space ever used.

Field System Name	Category	Field Length	Format	Alternate Names	Description
USERCMD	NUC	4	B	---	The total number of Adabas commands issued by users and processed during the Adabas nucleus session.
USERFLD1	UF	user-defined	user-defined	---	An Adabas Review user field, containing user-specified data for reports.
USERFLD2	UF	user-defined	user-defined	---	An Adabas Review user field, containing user-specified data for reports.
USERFLD3	UF	user-defined	user-defined	---	An Adabas Review user field, containing user-specified data for reports.
USERFLD4	UF	user-defined	user-defined	---	An Adabas Review user field, containing user-specified data for reports.
USERFLD5	UF	user-defined	user-defined	---	An Adabas Review user field, containing user-specified data for reports.
USERID	CLOG	28	B	USER-ID	The 28-byte Adabas communication ID of the user for whom the command was processed.
USER-ID	CLOG	28	B	USERID	Alternate name for USERID.
USERTYPE	TP	8	C	---	The type of TP system from which the Adabas call was issued. For example, if the Adabas call was issued from a CICS session, the `USERTYPE` field contains "CICS".

-V-

Field System Name	Category	Field Length	Format	Alternate Names	Description
VB	BUF	32	C	---	The contents of the Adabas value buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole value buffer is displayed. The VBSEG*nn* field may be used to display parts of the value buffer if it is more than 32 bytes long.
VBL	BUF	2	B	---	Corresponds to the ACB field `value buffer length` field. The value buffer contains the value used in search commands.
VBSEG*nn*	BUF	64	C	---	Represents a value buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `VBSEG01`, you obtain the first 64 bytes of the value buffer. The segment number may be a number between 01

Field System Name	Category	Field Length	Format	Alternate Names	Description
					and 32, inclusive. The field VBSEG*nn* is available for summary reports only; use the field VB for detail reports.

-W-

Field System Name	Category	Field Length	Format	Alternate Names	Description
WEEK	IT	1	B	WK	The week number of the week in which the Adabas command was processed.
WEEKDAY	IT	3	C	WEEK-DAY	The name of the day on which the Adabas command was processed.
WEEK-DAY	IT	3	C	WEEKDAY	Alternate name for WEEKDAY.
WK	IT	1	B	WEEK	Alternate name for WEEK.
WORKIO	CLOG	2	B	WORK-IO	The number of I/O operations performed against the Adabas Work data set for this command.
WORK-IO	CLOG	2	B	WORKIO	Alternate name for WORKIO.
WORKREAD	I/O	4	B	---	Contains the total number of Work read I/O operations performed during the Adabas session. This value is updated every minute and not when each command is issued.
WORKWRIT	I/O	4	B	---	The total number of Work write I/O operations performed during the Adabas session. This value is updated every minute and not when each command is issued.

-Y-

Field System Name	Category	Field Length	Format	Alternate Names	Description
YEAR	IT	1	B	YR	The year (in YYYY format) in which the Adabas command was processed.
YR	IT	1	B	YEAR	Alternate name for YEAR.

-Number-

Field System Name	Category	Field Length	Format	Alternate Names	Description
1M	IT	5	C	MINUTE MIN	Establishes 1-minute intervals for the collection of Adabas data.
5M	IT	5	C	M5	Establishes 5-minute intervals for the collection of Adabas data.
15M	IT	5	C	M15	Establishes 15-minute intervals for the collection of Adabas data.

Adabas Control Block Field Category (CB)

Fields in this category are derived from the Adabas control block (ACB). Refer to the *Adabas Command Reference Guide* supplied with your version of Adabas for more information.

Field System Name	Field Length	Format	Alternate Names	Description
ACBUSER	4	B	---	This field, comprising the last four bytes of the ACB, contains user data that is passed with the Adabas call. It is referred to as the `user area` field in the ACB, and is neither used nor modified by Adabas.
AD1	8	B	ADD1 ADDIT1	Alternate name for ADDIT1.
AD2	4	B	ADD2 ADDIT2	Alternate name for ADDIT2.
AD3	8	B	ADD3 ADDIT3	Alternate name for ADDIT3.
AD4	8	B	ADD4 ADDIT4	Alternate name for ADDIT4.
AD5	8	B	ADD5 ADDIT5	Alternate name for ADDIT5.
ADD1	8	B	AD1 ADDIT1	This name is used in the schema portion of the **summary record**. It is an alternate name for ADDIT1.
ADD2	4	B	AD2 ADDIT2	This name is used in the schema portion of the **summary record**. It is an alternate name for ADDIT2.

Field System Name	Field Length	Format	Alternate Names	Description
ADD3	8	B	AD3 ADDIT3	This name is used in the schema portion of the **summary record**. It is an alternate name for ADDIT3.
ADD4	8	B	AD4 ADDIT4	This name is used in the schema portion of the **summary record**. It is an alternate name for ADDIT4.
ADD5	8	B	AD5 ADDIT5	This name is used in the schema portion of the **summary record**. It is an alternate name for ADDIT5.
ADDIT1	8	B	ADD1 (used in **summary record**) AD1	Corresponds to the ACB field `additions 1`. The command to be executed determines whether this field is used and what the contents represent.
ADDIT2	4	B	ADD2 (used in **summary record**) AD2	Corresponds to the ACB field `additions 2`. The command to be executed determines whether this field is used and what the contents represent. When ADARUN parameter CLOGLAYOUT is set to 8, the content of this field is taken from the ACBX structure. Note that there are differences in meaning of the Additions 2 field in the ACBX and in the ACB. In the ACBX, some information that was formally available in the Additions 2 field is now split into several fields. For example, the error-related subcode information that was originally provided in the Additions 2 in the ACB is now provided in the Adabas ACBXSUBS (Subcomponent Response Subcode) field. The Additions 2 field will contain the transaction sequence number for an OP (open) and RE (read ET data) command. In Adabas Review, if the ADARUN parameter CLOGLAYOUT is set to 8, you will find the information from the older ACB Additions 2 structure in the following separate Adabas Review fields: ■ CMPRECL contains the compressed record length. ■ ERRFLDNM contains the error field name. ■ RSPSUB contains the subcode for an Adabas response code. ■ UCMPRECL contains the uncompressed record length.
ADDIT3	8	B	ADD3 (used in **summary record**) AD3	Corresponds to the ACB field `additions 3`. The command to be executed determines whether this field is used and what the contents represent.

Field System Name	Field Length	Format	Alternate Names	Description
ADDIT4	8	B	ADD4 (used in **summary record**) AD4	Corresponds to the ACB field `additions 4`. The command to be executed determines whether this field is used and what the contents represent.
ADDIT5	8	B	ADD5 (used in **summary record**) AD5	Corresponds to the ACB field `additions 5`. The command to be executed determines whether this field is used and what the contents represent.
CID	8	C	---	Corresponds to the hexadecimal value of the ACB field `command ID`. This field serves important functions, determined by the command, during command execution. For example, during a sequential read, the command ID is used to return the records to the user in the proper sequence. This field displays the value of the CID in hexadecimal format (for example, if CID=ABCD, it is displayed in this field as "C1C2C3C4").
CIDALPHA	4	C	---	Corresponds to the alphanumeric value of the ACB field `command ID`. This field serves important functions, determined by the command, during command execution. For example, during a sequential read, the command ID is used to return the records to the user in the proper sequence. This field displays the value of the CID in alphanumeric format.
CMD	2	C	COMMAND	Corresponds to the ACB field `command code`.
CMDNAME	14	C	CNAME	A translation of the 2-byte Adabas command code to a 14-byte string. For example, the command code BT is translated to "Backout Trans".
CMDRESP	4	B	CMDRSP MCR	The time, in milliseconds, required to process the Adabas call. In the command table, Adabas Review stores the minimum Adabas duration for each command type returning a zero response code. The command table is updated whenever a lower duration value is encountered. Command response time is thus based on the `command time` field in the Adabas command log. The values for CMDRESP in the history file are automatically stored in seconds. To display them correctly, they must be converted to milliseconds. For more information on this conversion, read *Migration from Previous Versions* , in the *Adabas Review Release Notes*. If you need to continue using the old scale and the old calculation algorithm for history data, contact your Software AG support representative.

Field System Name	Field Length	Format	Alternate Names	Description
				Due to changes in the display programs in SYSREVDB, you cannot use SYSREVDB in Adabas Review 4.4 (or earlier versions) to display the field contents of CMDRESP correctly, unless you stay with the old scale and algorithm.
CMDRSP	4	B	CMDRESP MCR	Alternate name for CMDRESP.
CMDSTAT	8	C	---	Contains the Adabas internal status for an Adabas command. For example, the Adabas command L3 has an internal status of SIMPLE and S1 has an internal status of COMPLEX.
CMPRECL	2	B	---	Contains the compressed record length of the record returned by a `READ` or a `FIND` command.
CNAME	14	C	CMDNAME	Alternate name for CMDNAME.
COMMAND	2	C	CMD	Alternate name for CMD.
COMMANDS	8	B	---	The number of Adabas commands processed for the control break.
COP1	1	C	OP1	Corresponds to the ACB field `command option 1`. The contents of this field is determined by the command being issued.
COP2	1	C	OP2	Corresponds to the ACB field `command option 2`. The contents of this field is determined by the command being issued.
DBID	2	B	---	The unique Adabas database identification number.
ERRFLDNM	2	C	---	Error field name. Contains the Adabas 2-character name for a field that has been found to be in error in the Adabas format or search buffer.
FILE	2	B	FNR (used in **summary record**)	Corresponds to the ACB field `file number`. The function of this field is determined by the Adabas command being issued.
FNR	2	B	FILE	This name is used in the schema portion of the **summary record**. It is an alternate name for FILE.
GLOBFMID	8	B	---	Contains the global internal format buffer ID for the Adabas call within a sequence of Adabas calls. This field is derived from ADDIT5 field.
ISN	4	B	---	Corresponds to the ACB field `ISN`. The use of this field is determined by the command being issued.
ISNLL	4	B	---	Corresponds to the ACB field `ISN lower limit`. The field contains the lowest ISN that Adabas returns when retrieving ISN lists. The use of this field is determined by the command being issued.

Field System Name	Field Length	Format	Alternate Names	Description
				Note: This field could be misinterpreted when used at the OP command, since the value of ISNLL as well as ISNQ are used for purposes other than the ISN lower limit or ISN quantity. Please refer to the Adabas Command Reference manual for further information.
ISNQ	4	B	---	Corresponds to a modification of the ACB field `ISN quantity`. The field is modified based on command type, and is suitable for performing mathematical calculations such as SUM and AVERAGE. The unmodified data can be found in the ORGISNQ field. **Note:** This field could be misinterpreted when used at the OP command, since the value of ISNQ as well as ISNLL are used for purposes other than the ISN lower limit or ISN quantity. Please refer to the Adabas Command Reference manual for further information.
MCR	4	B	CMDRESP CMDRSP	Alternate name for CMDRESP.
OP1	1	C	COP1	Alternate name for COP1.
OP2	1	C	COP2	Alternate name for COP2.
RSP	2	B		Corresponds to the ACB field `response code`. A response code of 0 indicates that the command executed successfully. This name is used in the schema portion of the **summary record**.
RSPSUB	4	B	---	Contains the Adabas response code subcode from the ACB field `Additions 2` or the ACBX field `ACBXERRC` for certain nonzero Adabas response codes.
THDURA	8	B	THTIME	The active thread time for a command. This is the time, in milliseconds, required to process the Adabas call, not including the wait time caused by I/O or other required resources. The value of this field is obtained from the command time field in the Adabas command log (LOX1CTME).
THTIME	8	B	THDURA	Alternate name for THDURA.
UCMPRECL	2	B	---	Uncompressed record length. The uncompressed length of the Adabas format or search buffer field.

Adabas Command Log Field Category (CLOG)

Field System Name	Field Length	Format	Alternate Names	Description
ASSOIO	2	B	ASSO-IO	The number of asynchronous Associator read I/Os for this command.
ASSO-IO	2	B	ASSOIO	Alternate name for ASSOIO.
CALLTYPE	8	C	---	Contains the type of the Adabas call that was issued. Possible values are: ■ "PHYSICAL": indicates a standard Adabas call ■ "REMOTE": indicates a call arriving via Entire Net-Work.
CMDTYPE	1	B	TYPECMD CMD-TYPE	The 1-byte `command type` field of the Adabas command log record that describes the internal Adabas status for the command. For example, a command type of 01 is a simple command and a command type of 42 is a complex command. The CMDSTAT field provides this translation.
CMD-TYPE	1	B	CMDTYPE TYPECMD	Alternate name for CMDTYPE.
DATAIO	2	B	DATA-IO	The number of asynchronous Data Storage read I/Os for this command.
DATA-IO	2	B	DATAIO	Alternate name for DATAIO.
DES	2	B	DESUPD	Alternate name for DESUPD.
DESUPD	2	B	DES	Contains the number of descriptors that were updated for an Adabas call.
DUR	4	B	DURATION DURAT	Alternate name for DURATION.
DURAT	4	B	DURATION DUR	Alternate name for DURATION.
DURATION	4	B	DURAT DUR	The amount of time that the command spent in the Adabas thread, including time spent waiting for I/O operations to complete. This field is expressed in seconds and is accurate to 4 decimal places. The field `ADADURA` contains the same value accurate to 6 decimal places.

Field System Name	Field Length	Format	Alternate Names	Description
ORGDURA	4	B	---	The (original) value of the "duration" field contained in the command log record. The time is expressed in units of 16 microseconds.
PRI	1	B	PRIORITY PRIO	Alternate name for PRIORITY.
PRIO	1	B	PRIORITY PRI	Alternate name for PRIORITY.
PRIORITY	1	B	PRI PRIO	The operating system priority for the user issuing the Adabas call.
SEQ	4	B	SEQUENCE	Alternate name for SEQUENCE.
SEQUENCE	4	B	SEQ	The Adabas command sequence number. The value is incremented by one for each Adabas command processed.
SRCHTYPE	8	C	---	The type of search or search algorithm. This field contains one of the following values if the Adabas command log is for version 8.2 SP2 or later: ■ ALGO-1: Search algorithm 1 was used. ■ ALGO-2: Search algorithm 2 was used. ■ ALGO-3: Search algorithm 3 was used. ■ ALGO-4: Search algorithm 4 was used. ■ MIXED: A nondescriptor search combined with a descriptor search was used. ■ NONDES: A nondescriptor search occurred. If the Adabas command log is for an older Adabas release (8.2 SP1 or earlier), the value of the SRCHTYPE field will be blank.
THD	1	B	THREAD	Alternate name for THREAD.
THREAD	1	B	THD	The Adabas thread number in which the Adabas command was processed.
TYPECMD	1	B	CMDTYPE CMD-TYPE	Alternate name for CMDTYPE.
USERID	28	B	USER-ID	The 28-byte Adabas communication ID of the user for whom the command was processed.
USER-ID	28	B	USERID	Alternate name for USERID.
WORKIO	2	B	WORK-IO	The number of I/O operations performed against the Adabas Work data set for this command.

Field System Name	Field Length	Format	Alternate Names	Description
WORK-IO	2	B	WORKIO	Alternate name for WORKIO.

Adabas Buffer Field Category (BUF)

Note: The data in the buffers may be meaningless if the Adabas response code is not zero.

Field System Name	Field Length	Format	Alternate Names	Description
FB	32	C	---	The contents of the Adabas format buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole format buffer is displayed. The FBSEG*nn* field may be used to display parts of the format buffer if it is more than 32 bytes long. Only one FBSEG*nn* field is allowed for each report.
FBFIELDS	2	C	FBF	Format buffer fields. Contains the Adabas 2-character name for each field contained in the Adabas format buffer. This field can only be used in Summary reports.
FBL	2	B	---	Corresponds to the ACB field `format buffer length`. The contents of this field is determined by the Adabas command issued.
FBSEG*nn*	64	C	---	Represents a format buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `FBSEG01` you obtain the first 64 bytes of the format buffer. The segment number may be a value between 01 and 32, inclusive. The field `FBSEGnn` is available for summary reports only; use the field FB for detail reports.
IB	32	C	---	The contents of the Adabas ISN buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole ISN buffer is displayed. The IBSEG*nn* field may be used to display parts of the ISN buffer if it is more than 32 bytes long.
IBL	2	B	---	Corresponds to the ACB field `ISN buffer length`. The use of this field is determined by the command being issued.
IBSEG*nn*	64	C	---	Represents an ISN buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `IBSEG01`, you obtain the first 64 bytes of the ISN buffer. The segment number may

Field System Name	Field Length	Format	Alternate Names	Description
				be a value between 01 and 32, inclusive. The field `IBSEGnn` is available for summary reports only; use the field IB for detail reports.
RB	32	C	---	The contents of the Adabas record buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole record buffer is displayed. The RBSEG*nn* field may be used to display parts of the record buffer if it is more than 32 bytes long.
RBL	2	B	---	Corresponds to the ACB field `record buffer length`. The record buffer is used primarily with read, search, and update commands.
RBSEG*nn*	64	C	---	Represents a record buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `RBSEG01`, you obtain the first 64 bytes of the record buffer. The segment number may be a number between 01 and 32, inclusive. The field RBSEG*nn* is available for summary reports only; use the field RB for detail reports.
SB	32	C	---	The contents of the Adabas search buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole search buffer is displayed. The SBSEG*nn* field may be used to display parts of the search buffer if it is more than 32 bytes long.
SBFIELDS	2	C	---	Search buffer fields. Contains the Adabas 2-character field name for each field contained in the Adabas search buffer. This field can only be used in Summary reports.
SBL	2	B	---	Corresponds to the ACB field `search buffer length`.
SBSEG*nn*	64	C	---	Represents a search buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `SBSEG01`, you obtain the first 64 bytes of the search buffer. The segment number may be a number between 01 and 32, inclusive. The field SBSEG*nn* is available for summary reports only; use the field SB for detail reports.
VB	32	C	---	The contents of the Adabas value buffer if one exists for the Adabas call. When used in a summary report, only the first 32 bytes of this field are displayed. When used in a detail report, the whole value buffer is displayed.

Field System Name	Field Length	Format	Alternate Names	Description
				The VBSEG*nn* field may be used to display parts of the value buffer if it is more than 32 bytes long.
VBL	2	B	---	Corresponds to the ACB field `value buffer length` field. The value buffer contains the value used in search commands.
VBSEG*nn*	64	C	---	Represents a value buffer segment of 64 bytes. The *nn* suffix is the segment number. For example, by specifying the field `VBSEG01`, you obtain the first 64 bytes of the value buffer. The segment number may be a number between 01 and 32, inclusive. The field VBSEG*nn* is available for summary reports only; use the field `VB` for detail reports.

Client Reporting Field Category (CMON)

Note: For information on how duration fields are calculated, read ***Adabas Review Duration Field Derivations***, elsewhere in this guide.

Field System Name	Field Length	Format	Alternate Names	Description
CDURA	8	B	---	The total client duration time. This is the total time (in seconds) in which the client waits for the command to be processed by the server and the time it takes the ADALNK portion of the client to retrieve the command results. CDURA is the sum of the CRCVDURA and CWRKDURA fields. Measurement for this field starts immediately after the command is passed to the server (when it is posted from the Adabas link routine to the Adabas address space and SVC-4 router processing is performed). Measurement stops when the client picks up the command result information from the server (performing SVC-16 router processing within the Adabas link routine).
CRCVDURA	8	B	---	The client receive time. This is the time (in seconds) it takes the Adabas link routine to retrieve a processed command from the server. Measurement for this field starts immediately after the server posts the Adabas link routine to retrieve the command result information (performing SVC-12 router processing) . Measurement stops when the Adabas link routine retrieves the command information from the server address space (performing SVC-16 router processing).

Field System Name	Field Length	Format	Alternate Names	Description
CWRKDURA	8	B	---	The client wait time, or the time in which the server works for the client. This is the time (in seconds) in which the client waits for the command to be processed by the server. Measurement for this field starts immediately after the command is passed to the server for processing (when it is posted from the Adabas link routine to the Adabas address space and SVC-4 processing is performed). Measurement stops when the Adabas link routine retrieves the command information from the server address space (performing SVC-12 router processing).

Interval and Time Field Category (IT)

Note: For information on how duration fields are calculated, read *Adabas Review Duration Field Derivations*, elsewhere in this guide.

Field System Name	Field Length	Format	Alternate Names	Description
15M	5	C	M15	Establishes 15-minute intervals for the collection of Adabas data.
1M	5	C	MINUTE MIN	Establishes 1-minute intervals for the collection of Adabas data.
5M	5	C	M5	Establishes 5-minute intervals for the collection of Adabas data.
ADADURA	4	B	---	Adabas duration. Corresponds to the `DURATION` field. This field contains the amount of time (in seconds) that the command spent in the Adabas thread, including the time spent waiting for the completion of I/O operations. The `ADADURA` field differs from the `DURATION` and `ORGDURA` fields in that the time is computed to 6 decimal places instead of 4 decimal places.
CQDURA	4	B	---	Command queue duration. Contains the amount of time (in seconds) that a command waited in the command queue before being dispatched into an Adabas thread.
DATE	8	C	---	The date (in YYYY-MM-DD format) when the Adabas command was processed.
DAY	1	B	---	The day number (within a month) when the Adabas command was processed.

Field System Name	Field Length	Format	Alternate Names	Description
ENDDATE	4	T	---	The date (in YYYY-MM-DD format) when the last Adabas command was processed within the current report control break.
ENDTIME	4	T	---	The time (in 24-hour format) when the last Adabas command was processed within the current report control break.
ESTCPU	6.6	N	---	The estimated CPU time used by each Adabas command. The values shown in this field are only relative approximations of the CPU time used; they are not based on any actual CPU times and are calculated, instead, based on an algorithm. The algorithm used varies for each Adabas command type and is based on the number of instructions, I/Os, descriptors, and fields used. This field can be used as a SUM, MIN, MAX and/or AVG field.
FULLSTCK	8	T	---	The 8-byte store clock value taken when the Adabas command was processed.
HOUR	5	C	HR	The hour (in 24-hour format) when the Adabas command was processed.
HR	5	C	HOUR	Alternate name for HOUR.
M15	5	C	15M	Alternate name for 15M.
M5	5	C	5M	Alternate name for 5M.
MIN	5	C	1M MINUTE	Alternate name for 1M.
MINUTE	5	C	1M MIN	Alternate name for 1M.
MO	1	B	MONTH MON	Alternate name for MONTH.
MON	1	B	MON MO	Alternate name for MONTH.
MONAME	3	C	---	The name of the month when the Adabas command was processed.
MONTH	1	B	MON MO	The number of the month when the Adabas command was processed.
QTR	1	B	QUARTER QUAR	Alternate name for QUARTER.

Field System Name	Field Length	Format	Alternate Names	Description
QUAR	1	B	QUARTER QTR	Alternate name for QUARTER.
QUARTER	1	B	QUAR QTR	The quarter of the year in which the Adabas command was processed.
STRTDATE	4	T	---	The date (in YYYY-MM-DD format) when the first Adabas command was processed within the current report control break.
STRTTIME	4	T	---	The time (in 24-hour format) when the first Adabas command was processed within the current report control break.
TIME	8	C	---	The time (in 24-hour format) when the first Adabas call was processed.
TOTDURA	4	B	---	Total duration. Contains the amount of time the command was in the Adabas thread plus the amount of time the command waited in the command queue. The TOTDURA field is the sum of the ADADURA and CQDURA field values expressed in seconds.
WEEK	1	B	WK	The week number of the week in which the Adabas command was processed.
WEEKDAY	3	C	WEEK-DAY	The name of the day on which the Adabas command was processed.
WEEK-DAY	3	C	WEEKDAY	Alternate name for WEEKDAY.
WK	1	B	WEEK	Alternate name for WEEK.
YEAR	1	B	YR	The year (in YYYY format) in which the Adabas command was processed.
YR	1	B	YEAR	Alternate name for YEAR.

Adabas I/O Field Category (I/O)

Field System Name	Field Length	Format	Alternate Names	Description
ASSOREAD	4	B	----	Associator read. The total number of Associator read I/Os that occurred during the Adabas session. This value is updated every minute and not when each command is issued.
ASSOWRIT	4	B	---	Associator write. The total number of Associator write I/Os that occurred during the Adabas session. This value is updated every minute and not when each command is issued.

Field System Name	Field Length	Format	Alternate Names	Description
DATAREAD	4	B	---	The total number of Adabas Data Storage read I/Os for the Adabas session. This value is updated every minute and not when each command is issued.
DATAWRIT	4	B	---	The total number of Adabas Data Storage write I/Os for the Adabas session. This value is updated every minute and not when each command is issued.
IO	2	B	IOS	This name is used in the schema portion of the **summary record**. It is an alternate name for IOS.
IOS	2	B	IO (used in **summary record**)	The total number of I/Os for the command processed; it is the sum of `ASSOIO`, `DATAIO` and `WORKIO`.
IOCOMP	3	C	---	Identifies the Adabas component against which the I/O was issued. For example, if the I/O is issued against Data Storage extent 1, the field contains DS1. If the I/O is issued against address converter extent 3, the field contains AC3.
IOFUNC	5	C	---	The type of I/O operation performed against an Adabas component. The values for this field are "READ" or "WRITE".
IOLIST	10	C	---	The hexadecimal I/O list for a command obtained from the Adabas command log record. Four bytes are allocated for each I/O list entry.
IOPHYS	16	C	---	A translation of the I/O list entry from the Adabas command log record. The format for this field is *comp-x nnnnnn*, where: *comp* is the Adabas component (ASSO, DATA, or WORK) *x* is the type of I/O, ("R" for read or "W" for write) *nnnnnn* is the RABN (relative Adabas block number)
IORABN	8	C	---	The relative Adabas block number against which the I/O was performed.
IOTOCMD	4	B	---	The ratio of the total number of I/O operations performed to the total number of commands processed.
IOTYPE	4	C	---	Identifies the component against which the I/O operation was performed. Values for this field may be ASSO 'Associator', DATA 'Data Storage', or WORK 'Work data set'.
IOVOLSER	6	C	---	Contains the volume serial number against which the I/O operation was performed. This field may be used to show Adabas I/O distribution. For WORK I/Os (see the IOTYPE field) the IOVOLSER field will contain the text "UNKNWN". If the data is obtained from blocks that are stored in the Adabas buffer pool and therefore no physical I/Os are made, this field will be empty.

Field System Name	Field Length	Format	Alternate Names	Description
TOTALIOS	4	B	---	Contains the total number of I/Os performed against all Adabas components for the Adabas session; the sum of ASSOREAD, ASSOWRIT, DATAREAD, DATAWRIT, WORKREAD, and WORKWRIT. This value is updated every minute and not when each command is issued.
WORKREAD	4	B	---	Contains the total number of Work read I/O operations performed during the Adabas session. This value is updated every minute and not when each command is issued.
WORKWRIT	4	B	---	The total number of Work write I/O operations performed during the Adabas session. This value is updated every minute and not when each command is issued.

Natural Field Category (NAT)

Field System Name	Field Length	Format	Alternate Names	Description
LEVEL	2	B	NATLEVEL	Alternate name for NATLEVEL.
LIB	8	C	NATLIB	Alternate name for NATLIB.
LOG	8	C	NATAPPL LOGON	This name is used in the schema portion of the **summary record**. It is an alternate name for NATAPPL.
LOGON	8	C	NATAPPL LOG (used in **summary record**)	Alternate name for NATAPPL.
NATAPPL	8	C	LOGON LOG (used in **summary record**)	The Natural application name (or library) to which the user issued a LOGON. This field does not necessarily show the library of the Natural object from which the Adabas call is issued. Under SQL, this field contains the library name.
NATCLTID	8	C	---	NATCLTID displays the client user ID of a user using a Natural server. NATCLTID only contains a value if an RPC client request is executed in a Natural RPC server session. In all other cases the field is empty.
NATCOUNT	2	B	---	The total number of Adabas calls generated by the user application since the last terminal I/O.
NATEXEC	2	B	---	The number of times a Natural object that issues Adabas calls has been executed. NATEXEC is "1" if the Natural object has issued an Adabas call for the first time on this level; for each subsequent Adabas call on this level the value will be set to zero. You can use the SUM statement

Field System Name	Field Length	Format	Alternate Names	Description
				to total the values of this field to obtain the total number of times a specific Natural object has been called.
NATGRP	8	C	---	The current Natural security group to which the user belongs.
NATLEVEL	2	B	LEVEL	The Natural call level of the Natural program issuing the Adabas call. For example, a CALLNAT routine that is called from a program and issues an Adabas call has a Natural level of 2.
NATLIB	8	C	LIB	The name of the Natural library where the object is located that is currently executed.
NATPROG	8	C	PROGRAM PRO (used in **summary record**)	The name of the Natural program that issued the Adabas call. When Natural internally issues Adabas calls to load Natural objects, this value is not updated. Under SQL, this field contains the program name.
NATRPCCO	16	C	---	The 16-byte alphanumeric value of the conversation ID from the Natural RPC Server.
NATRPCID	16	C	---	The 16-byte alphanumeric value for the store clock value used as identification of the Natural RPC Server.
NATSTMT	4	C	---	The Natural statement number where the Adabas command is processed. This line number is the line in the Natural program displayed by NATPROG. When the processed Adabas command is in the copy code portion of the Natural program, the line number refers to the copy code. The name of the copy code is not available at this time.
NATUID	8	C	---	The name of the Natural library to which the user is currently logged on. This is the value of the Natural system variable *APPLIC-ID.
PRO	8	C	NATPROG PROGRAM	This name is used in the schema portion of the **summary record**. It is an alternate name for NATPROG.
PROGRAM	8	C	NATPROG PRO (used in **summary record**)	Alternate name for NATPROG.

Adabas Nucleus Field Category (NUC)

Field System Name	Field Length	Format	Alternate Names	Description
ABALLOC	4	B	---	The number of bytes of attached buffer space currently used. An attached buffer is an internal buffer used for interregion communication.
ABDATE	8	C	---	The date (in YYYY-MM-DD format) when the attached buffer high-water mark was reached.
ABENT	4	B	---	The current number of attached buffer entries.
ABPCT	4	B	---	The maximum percentage of attached buffer space used during the Adabas nucleus session.
ABSIZE	4	B	---	The total amount (in bytes) of attached buffer space allocated at Adabas nucleus startup.
ABTIME	8	C	---	The time (in HH:MM:SS format) that the attached buffer high-water mark was reached.
ABUSED	4	B	---	The maximum number (in bytes) of attached buffer space used during the Adabas nucleus session.
BUFFEFF	4	B	---	Buffer efficiency. Contains the ratio of the number of calls to the Adabas buffer pool manager to the number of Adabas physical read requests made to the Associator and the Data Storage devices. For example, if the number of read I/Os is 100 and the number of calls to the buffer pool manager is 500, the buffer efficiency is 500/100 or 5. The higher the buffer efficiency number, the more efficient is the use of buffer space. If the buffer efficiency number is low, it is recommended that you increase the LBP (length of buffer pool) ADARUN parameter.
BUFFLUSH	4	B	---	The number of times that the Adabas buffer pool (LBP) was flushed during the Adabas nucleus session.
BUFFWAIT	4	B	---	The number of times that Adabas Review had to wait for a buffer.
CQALLOC	4	B	---	The number of bytes of command queue space currently used.
CQDATE	8	C	---	The date (in YYYY-MM-DD format) when the command queue high-water mark was reached.
CQENT	4	B	---	The current number of command queue entries.
CQJOB	8	C	---	The job or started task name for the user obtained from the user's command queue element.
CQMAXENT	4	B	---	The maximum number of entries that have been in the command queue for the Adabas nucleus session.

Field System Name	Field Length	Format	Alternate Names	Description
CQPCT	4	B	---	The maximum percentage of command queue space used during the Adabas nucleus session.
CQSIZE	4	B	---	The total number of bytes of command queue space allocated at Adabas nucleus startup.
CQTIME	8	B	---	The time (in HH:MM:SS format) when the command queue high-water mark was reached.
CQUQADDR	8	B	---	The address of the User Queue Element found in the CQE.
CQUSED	4	B	---	The maximum number of bytes of command queue space used during the Adabas nucleus session.
DBNAME	16	C	---	The 16-character name assigned to the database when it was created.
FILENAME	16	C	---	Contains the 16-character name assigned to the Adabas file, and is obtained from the Adabas file control block (FCB). If the file name is not available, the field contains "FCB-UNAVAILABLE".
FILETYPE	6	C	---	Contains the 6-character type assigned to the Adabas file. This field contains the string "USER" if the file is a user file or "SYSTEM" if the Adabas Checkpoint file was read or updated.
FORMATOW	4	B	---	The total number of Adabas internal format overwrites that have occurred during the Adabas nucleus session.
FORMATTR	4	B	---	The total number of Adabas internal format translations that have occurred during the Adabas nucleus session.
HOLDISN	2	B	---	The numbers of ISNs which are in HOLD status by the user at the time this command is executed. The number is obtained after the execution of this command.
HQDATE	8	C	---	The date (in YYYY-MM-DD format) that the hold queue high-water mark was reached.
HQENT	4	B	---	The current number of hold queue entries.
HQPCT	4	B	---	The maximum percentage of hold queue space used during the Adabas nucleus session.
HQSIZE	4	B	---	The total number of bytes allocated to the hold queue at Adabas nucleus startup.
HQTIME	8	C	---	The time (in HH:MM:SS format) that the hold queue high-water mark was reached.
HQUSED	4	B	---	The maximum number of bytes of hold queue space used during the Adabas nucleus session.
HQUSRENT	4	B	---	The number of hold queue user entries.
LFPALLOC	4	B	---	The number of bytes currently used in the format pool.
LFPENT	4	B	---	The current number of entries in the format pool.

Field System Name	Field Length	Format	Alternate Names	Description
LFPMAX	4	B	---	The maximum number of bytes of format pool space used during the Adabas nucleus session.
LFPPCT	4	B	---	The maximum percentage of format pool space used during the Adabas nucleus session.
LFPSIZE	4	B	---	The total number of bytes allocated to the format pool at Adabas nucleus startup.
LFPUSED	4	B	---	The maximum number of bytes of format pool space used during the Adabas nucleus session.
LWPALLOC	4	B	---	The number of bytes of the work pool currently in use.
LWPENT	4	B	---	The current number of work pool entries.
LWPMAX	4	B	---	The maximum number of bytes of work pool space used during the Adabas nucleus session.
LWPMXENT	4	B	---	The maximum number of work pool entries used during the Adabas nucleus session.
LWPPCT	4	B	---	The maximum percentage of work pool space used during the Adabas nucleus session.
LWPSIZE	4	B	---	The number of bytes that were allocated to the work pool at Adabas nucleus startup.
LWPUSED	4	B	---	The maximum number of bytes of work pool space used during the Adabas nucleus session.
MULTICNT	8	N	--	The number of multifetch records returned. For all read calls (L*x* commands), multifetch returns a group of records in the record buffer and a description of these records in either the caller's ISN buffer (for ACB interface direct calls) or the caller's multifetch buffer (for ACBX interface direct calls). Multifetch records are only returned if the ACB or ACBX call contain an <literalvalue>M</literalvalue> in Command Option 1.
NUCID	3	B	SMP (used in **summary record**)	The ID of an Adabas nucleus in an Adabas Parallel Services or Adabas Cluster Services environment.
SMP	3	B	NUCID	This name is used in the schema portion of the **summary record**. It is an alternate name for NUCID.
SVC	1	B	---	The Adabas SVC (supervisor call) number used for interregion communication between the user's address space and the Adabas nucleus address space.
SYSCMD	4	B	---	The number of Adabas system commands that have been executed. Adabas system commands execute in Adabas threads 0 and -1.

Field System Name	Field Length	Format	Alternate Names	Description
THDNUM	4	B	---	The number of 8K Adabas threads in the nucleus. The number includes the two Adabas system threads (threads 0 and -1).
THREADSW	4	B	---	The number of thread switches that have occurred during the Adabas nucleus session.
THROWBKS	4	B	---	The number of command throwbacks that have occurred during the Adabas nucleus session. Throwbacks occur when the record you wish to retrieve has been placed on hold by another user. The command you issued is placed on the command queue ("thrown back") for reprocessing.
TIALLOC	4	B	---	The number of bytes of LI (ISN list table) space currently used.
TIDATE	8	C	---	The date (in YYYY-MM-DD format) when the LI (ISN list table) high-water mark was reached.
TIENT	4	B	---	The current number of entries used in the LI (ISN list table).
TIPCT	4	B	---	The maximum percentage of LI (ISN list table) space used during the Adabas nucleus session.
TISIZE	4	B	---	The number of bytes allocated to the LI (ISN list table) at Adabas nucleus startup.
TITIME	8	C	---	The time (in HH:MM:SS format) that the LI (ISN list table) high-water mark was reached.
TIUSED	4	B	---	The maximum number of bytes of LI (ISN list table) space used during the Adabas nucleus session.
TOTALCMD	4	B	---	The total number of Adabas system and user commands that have been processed during the Adabas nucleus session.
TSALLOC	4	B	---	The number of bytes in the LQ (table of sequential commands) currently being used.
TSDATE	8	C	---	The date (in YYYY-MM-DD format) when the LQ (table of sequential commands) high-water mark was reached.
TSENT	4	B	---	The current number of entries in the LQ (table of sequential commands).
TSPCT	4	B	---	The maximum percentage of LQ (table of sequential commands) space used during the Adabas nucleus session.
TSSIZE	4	B	---	The number of bytes allocated to the LQ (table of sequential commands) at Adabas nucleus startup.
TSTIME	8	C	---	The time (in HH:MM:SS format) when the LQ (table of sequential commands) high-water mark was reached.
TSUSED	4	B	---	The maximum number of bytes used in the LQ (table of sequential commands) during the Adabas nucleus session.
UQALLOC	4	B	---	The number of bytes of user queue space currently in use.

Field System Name	Field Length	Format	Alternate Names	Description
UQDATE	8	C	---	The date (in YYYY-MM-DD) format when the user queue high-water mark was reached.
UQENT	4	B	---	The current number of user queue entries.
UQPCT	4	B	---	The maximum percentage of user queue space used during the Adabas nucleus session.
UQSIZE	4	B	---	The number of bytes allocated to the user queue at Adabas nucleus startup.
UQTIME	8	C	---	The time (in HH:MM:SS format) when the user queue high-water mark was reached.
UQUSED	4	B	---	The maximum number of bytes of user queue space ever used.
USERCMD	4	B	---	The total number of Adabas commands issued by users and processed during the Adabas nucleus session.

Operating System Field Category (OS)

Note: For information on how duration fields are calculated, read *Adabas Review Duration Field Derivations*, elsewhere in this guide.

Field System Name	Field Length	Format	Alternate Names	Description
ACCTINF2	16	C	---	Accounting information about the user that issued the Adabas call for z/OS batch jobs. This field will contain the second value specified in the account field of the job card.
ACCTINFO	16	C	---	Accounting information about the user that issued the Adabas call. For z/OS batch jobs, the field will contain the first value specified in the account field of the job card. For Com-plete users, the field will contain the account information specified in the user's Com-plete profile.
CPUID	8	B	---	The internal identifying serial number of the CPU from which the Adabas call was issued. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter `ADAMODE=0` (the default value is 2).
JMREDATE	10	C	---	The date (in YYYY-MM-DD format) when the batch job was entered in JES or from the job information macro.
JOB	8	C	JOBNAME	Alternate name for JOBNAME.

Field System Name	Field Length	Format	Alternate Names	Description
JOBCLASS	1	B	---	(z/OS only) The one-byte character of the CLASS parameter in the job card.
JOBID	8	C	---	A combination of the job identifier and the job number of the user who issued the Adabas call. This field is available under z/OS and z/VSE: ■ Under z/OS, the field will contain JOB, STC, or TSU as the job identifier followed by a 5-byte JES job number. ■ Under z/VSE, the field will contain JOB as the identifier, followed by the 5-byte POWER job number.
JOBNAME	8	C	JOB	The name of the job or task from which the Adabas call was issued. This field is the contents of the JOBNAME from the Adabas command log record and may not reflect the actual JOBNAME of the task that issued the Adabas call.
JOBNUM	5	C	---	The job number of the user who issued the Adabas call. This field is available under z/OS and z/VSE. The field will contain an alphanumeric, 5-byte value for the JES (z/OS) or POWER (z/VSE) job number.
LPARNAME	8	C	---	The system LPAR or partition name (in z/OS or z/VSE environments) or the environment name from the job information macro (in BS2000 environments).
LUNAME	8	C	---	The VTAM LU (logical unit) name of the user who issued the Adabas call. If the TP system is Com-plete, the `LUNAME` field contains the Com-plete ID: ■ The first 3 bytes of the ID represent the Com-pass stack level ■ The fourth byte is the Com-plete patch character ■ The last 4 bytes identify the Com-plete terminal ID number in hexadecimal format. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter `ADAMODE=0` (the default value is 2).
OPSYSID	4	B	---	The operating system ID. The address of the ASCB (address space control block) for the job or task that issued the Adabas call. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter `ADAMODE=0` (the default value is 2).
OPSYSNAM	8	C	---	The operating system name (SYSNAME) that is specified in the SYS1.PARMLIB and which will be obtained from the CVT

Field System Name	Field Length	Format	Alternate Names	Description
				(in z/OS environments) or the operating system name and version number (in BS2000 environments).
ROUTDURA	8	B	ROUTTIME	The amount of time between the time a command was issued by the application and the time it was queued in the Adabas command queue. For Adabas 8.1 and earlier, this field is expressed in seconds; for Adabas 8.2 and later releases, this field is expressed in milliseconds.
ROUTTIME	8	B	ROUTDURA	Alternate name for ROUTDURA.
STEPNAME	8	C	---	The name of the job step or task step that issued the Adabas call. This step is only available in z/OS environments.

Transaction Processing Monitor Field Category (TP)

Field System Name	Field Length	Format	Alternate Names	Description
ACINAME	8	C	CURENPGM	The program name of the Adabas CICS link routine for the DCI interface: ADADCI.
CALLPGM	8	C	---	The program that executed the last EXEC CICS LINK or XCTL command. ■ In non-DCI situations, this is the program calling the Adabas CICS link routine via EXEC CICS LINK ■ In DCI interface situations (used by Natural), this is the name of the executing program if there was no previous EXEC CICS LINK or, if there was a previous EXEC CICS LINK, the name of the program that executed the last EXEC CICS LINK.
CQEUID	28	B	---	Contains the 28-byte Adabas communication user ID for the user who issued the Adabas call. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter `ADAMODE=0` (the default value is 2).
CURENPGM	8	C	ACINAME	Alternate name for ACINAME.
ETID	8	C	---	The Adabas ET (end transaction) ID that was established during the OP (open) call to Adabas. The contents of the field is determined by the calling program. If the first character provided for the ETID is smaller than "A" through "9", Adabas Review will show null value (blanks) in this field. If the first character is in the range "A" through "9",

Field System Name	Field Length	Format	Alternate Names	Description
				but the following characters are nonprintable characters, Adabas Review will display them in alphanumeric format, which might result in blanks or special characters. To display this field in hexadecimal, an Adabas Review user field can be used.
SECGID	8	C	---	Contains the security system group ID for the user who issued the Adabas call. This field is available under z/OS when the user is running with an external security system (RACF, ACF2, or Top Secret).
SECUID	8	C	---	Contains the security system user ID for the user who issued the Adabas call. This field is available under z/OS when the user is running with an external security system (RACF, ACF2, or Top Secret).
TID	2	B	---	The Com-plete terminal ID number of the user who issued the Adabas call.
TPTRANCT	4	B	---	A transaction count field. Possible values for this field are either "1" or "0" (zero). A transaction is started with a TP terminal read and completed with a TP terminal write. For the first command of a transaction by a user, this field is set to "1". For all subsequent calls of the same transaction for the same user, this field is set to "0". This field is most useful as a SUM field in conjunction with the field TRANSID. Used in this manner, you can determine the work rate per transaction.
TPTRANNM	4	B	---	The transaction number as established by the user's TP system for the transaction that issued the Adabas call.
TPUSER	8	C	TPUSERID	Alternate name for TPUSERID.
TPUSERID	8	C	TPUSER	The user ID on the TP monitor from which the Adabas call was issued.
TRANSID	8	C	---	The name of the root transaction or program that issued the Adabas call.
TRUENAME	8	C	---	The name of the Adabas CICS link routine TRUE exit.
UBUID	8	C	---	Contains the last 8 bytes of the 28-byte Adabas communication ID (CQEUID) for the user who issued the Adabas call. **Note:** This field may contain different data when an X'48' call is issued. To avoid such a call in Natural, set Natural parameter ADAMODE=0 (the default value is 2).
UOWID	8	C	---	Contains the instance number and the sequence number of the CICS field `NETUOWID`, which is 27 bytes long. This field can only be filled in by CICS. The evaluation of this field requires a large amount of CPU time and, therefore, can only be activated by a special zap. Following is a description of the bytes in `NETUOWID`:

Field System Name	Field Length	Format	Alternate Names	Description
				■ Offset 0 (Length 1): The length (L) of the Logical-Unit-of-Work-Identifier-Field, not including this field. The NETUOWID contains Logical-Unit-of-Work-Identifier-Field plus padding bytes. Values: 0 or 10 < = L < = 26. ■ Offset 1 (Length 1): The length of Network Name, not including this field, m = L - 9 , 1 < = m < = 17. ■ Offset 2 (Length m): Network name, format: ABCDEFGH.ABCDEFGH, Networkid.Luname. ■ Offset m + 2 (Length 6): Instance number. ■ Offset m + 2 + 6 (Length 2): Sequence number. ■ Offset m + 2 + 6 + 2 (Length until 27): Residual data.
UQUID	4	B	---	Contains the unique 4-byte UQE (user queue element) user ID for the user who issued the Adabas call. This value is allocated in numerically ascending sequence for each UQE allocated by the Adabas nucleus.
USERTYPE	8	C	---	The type of TP system from which the Adabas call was issued. For example, if the Adabas call was issued from a CICS session, the USERTYPE field contains "CICS".

User Field Category (UF)

Field System Name	Field Length	Format	Alternate Names	Description
USERFLD1 through USERFLD5	user-defined	user-defined	---	These are user fields, made available to you so you can report on data you choose. For complete information about defining and using Adabas Review user fields, read *Defining Adabas Review User Fields*, in the *Adabas Review Administration Guide*.

Fields Available for Client Reporting Reports

The following table summarizes all of the fields available for client reporting reports. This represents the fields in the **CMON category** as well as a subset of the fields in other field categories.

Field Name	Category	Description
5M	**IT**	Establishes 5-minute intervals for the collection of Adabas data.
15M	**IT**	Establishes 15-minute intervals for the collection of Adabas data.
ACCTINF2	**Operating System Fields (OS)**	Accounting information about the user that issued the Adabas call for z/OS batch jobs. This field will contain the second value specified in the account field of the job card.
ACCTINFO	**Operating System Fields (OS)**	Accounting information about the user that issued the Adabas call. For z/OS batch jobs, the field will contain the first value specified in the account field of the job card. For Com-plete users, the field will contain the account information specified in the user's Com-plete profile.
ACINAME	**Transaction Processing Monitor Fields (TP)**	The program name of the Adabas CICS link routine for the DCI interface: ADADCI.
ADADURA	**Interval and Time Fields (IT)**	Adabas duration. Corresponds to the `DURATION` field. This field contains the amount of time (in seconds) that the command spent in the Adabas thread, including the time spent waiting for the completion of I/O operations. The `ADADURA` field differs from the `DURATION` and `ORGDURA` fields in that the time is computed to 6 decimal places instead of 4 decimal places.
ADD1	**Adabas Control Block Fields (CB)**	Corresponds to the ACB field `additions 1`. The command to be executed determines whether this field is used and what the contents represent.
ADD2	**Adabas Control Block Fields (CB)**	Corresponds to the ACB field `additions 2`. The command to be executed determines whether this field is used and what the contents represent. When ADARUN parameter CLOGLAYOUT is set to 8, the content of this field is taken from the ACBX structure. Note that there are differences in meaning of the Additions 2 field in the ACBX and in the ACB. In the ACBX, some information that was formally available in the Additions 2 field is now split into several fields. For example, the error-related subcode information that was originally provided in the Additions 2 in the ACB is now provided in the Adabas ACBXSUBS (Subcomponent Response Subcode) field. The Additions 2 field will contain the transaction sequence number for an OP (open) and RE (read ET data) command. In

Field Name	Category	Description
		Adabas Review, if the ADARUN parameter CLOGLAYOUT is set to 8, you will find the information from the older ACB Additions 2 structure in the following separate Adabas Review fields: ■ CMPRECL contains the compressed record length. ■ ERRFLDNM contains the error field name. ■ RSPSUB contains the subcode for an Adabas response code. ■ UCMPRECL contains the uncompressed record length.
ADD3	**Adabas Control Block Fields (CB)**	Corresponds to the ACB field `additions 3`. The command to be executed determines whether this field is used and what the contents represent.
ADD4	**Adabas Control Block Fields (CB)**	Corresponds to the ACB field `additions 4`. The command to be executed determines whether this field is used and what the contents represent.
ADD5	**Adabas Control Block Fields (CB)**	Corresponds to the ACB field `additions 5`. The command to be executed determines whether this field is used and what the contents represent.
CALLPGM	**Transaction Processing Monitor Fields (TP)**	The program that executed the last EXEC CICS LINK or XCTL command. ■ In non-DCI situations, this is the program calling the Adabas CICS link routine via EXEC CICS LINK ■ In DCI interface situations (used by Natural), this is the name of the executing program if there was no previous EXEC CICS LINK or, if there was a previous EXEC CICS LINK, the name of the program that executed the last EXEC CICS LINK.
CALLTYPE	**Adabas Command Log Fields (CLOG)**	Contains the type of the Adabas call that was issued. Possible values are: ■ "PHYSICAL": indicates a standard Adabas call ■ "REMOTE": indicates a call arriving via Entire Net-Work.
CDURA	**Client Reporting Fields (CMON)**	The total client duration time. This is the total time (in seconds) in which the client waits for the command to be processed by the server and the time it takes the ADALNK portion of the client to retrieve the command results. CDURA is the sum of the CRCVDURA and CWRKDURA fields.
CID	**Adabas Control Block Fields (CB)**	Corresponds to the hexadecimal value of the ACB field `command ID`. This field serves important functions, determined by the command, during command execution. For example, during a sequential read, the command ID is used to return the records to the user in the proper sequence. This field displays the value

Field Name	Category	Description
		of the CID in hexadecimal format (for example, if CID=ABCD, it is displayed in this field as "C1C2C3C4").
CMD	Adabas Control Block Fields (CB)	Corresponds to the ACB field `command code`.
CMPRECL	Adabas Control Block Fields (CB)	Contains the compressed record length of the record returned by a `READ` or a `FIND` command.
COMMANDS	Adabas Control Block Fields (CB)	The number of Adabas commands processed for the control break.
CQDURA	Interval and Time Fields (IT)	Command queue duration. Contains the amount of time (in seconds) that a command waited in the command queue before being dispatched into an Adabas thread.
CRCVDURA	Client Reporting Fields (CMON)	The client receive time. This is the time (in seconds) it takes the Adabas link routine to retrieve a processed command from the server.
CWRKDURA	Client Reporting Fields (CMON)	The client wait time, or the time in which the server works for the client. This is the time (in seconds) in which the client waits for the command to be processed by the server.
DATE	Interval and Time Fields (IT)	The date (in YYYY-MM-DD format) when the Adabas command was processed.
DAY	Interval and Time Fields (IT)	The day number (within a month) when the Adabas command was processed.
DBID	Adabas Control Block Fields (CB)	The unique Adabas database identification number.
DURATION	Adabas Command Log Fields (CLOG)	The amount of time that the command spent in the Adabas thread, including time spent waiting for I/O operations to complete. This field is expressed in seconds and is accurate to 4 decimal places. The field `ADADURA` contains the same value accurate to 6 decimal places.
ENDDATE	Interval and Time Fields (IT)	The date (in YYYY-MM-DD format) when the last Adabas command was processed within the current report control break.
ENDTIME	Interval and Time Fields (IT)	The time (in 24-hour format) when the last Adabas command was processed within the current report control break.
ERRFLDNM	Adabas Control Block Fields (CB)	Error field name. Contains the Adabas 2-character name for a field that has been found to be in error in the Adabas format or search buffer.
FILE	Adabas Control Block Fields (CB)	Corresponds to the ACB field `file number`. The function of this field is determined by the Adabas command being issued. Fields FILE and FNR are alternate names for the same data; you can use either field in your reports.
FNR	Adabas Control Block Fields (CB)	Corresponds to the ACB field `file number`. The function of this field is determined by the Adabas command being issued. Fields FILE and FNR are alternate names for the same data; you can use either field in your reports.

Field Name	Category	Description
FULLSTCK	Interval and Time Fields (IT)	The 8-byte store clock value taken when the Adabas command was processed.
HOUR	Interval and Time Fields (IT)	The hour (in 24-hour format) when the Adabas command was processed.
ISN	Adabas Control Block Fields (CB)	Corresponds to the ACB field `ISN`. The use of this field is determined by the command being issued.
ISNLL	Adabas Control Block Fields (CB)	Corresponds to the ACB field `ISN lower limit`. The field contains the lowest ISN that Adabas returns when retrieving ISN lists. The use of this field is determined by the command being issued. **Note:** This field could be misinterpreted when used at the OP command, since the value of ISNLL as well as ISNQ are used for purposes other than the ISN lower limit or ISN quantity. Please refer to the Adabas Command Reference manual for further information.
ISNQ	Adabas Control Block Fields (CB)	Corresponds to a modification of the ACB field `ISN quantity`. The field is modified based on command type, and is suitable for performing mathematical calculations such as SUM and AVERAGE. The unmodified data can be found in the ORGISNQ field. **Note:** This field could be misinterpreted when used at the OP command, since the value of ISNQ as well as ISNLL are used for purposes other than the ISN lower limit or ISN quantity. Please refer to the Adabas Command Reference manual for further information.
JMREDATE	Operating System Fields (OS)	The date (in YYYY-MM-DD format) when the batch job was entered in JES or from the job information macro.
JOBCLASS	Operating System Fields (OS)	(z/OS only) The one-byte character of the CLASS parameter in the job card.
JOBID	Operating System Fields (OS)	A combination of the job identifier and the job number of the user who issued the Adabas call. This field is available under z/OS and z/VSE: ■ Under z/OS, the field will contain JOB, STC, or TSU as the job identifier followed by a 5-byte JES job number. ■ Under z/VSE, the field will contain JOB as the identifier, followed by the 5-byte POWER job number.
JOBNAME	Operating System Fields (OS)	The name of the job or task from which the Adabas call was issued. This field is the contents of the JOBNAME from the Adabas command log record and may not reflect the actual JOBNAME of the task that issued the Adabas call.

Field Name	Category	Description
JOBNUM	OS	The job number of the user who issued the Adabas call. This field is available under z/OS and z/VSE. The field will contain an alphanumeric, 5-byte value for the JES (z/OS) or POWER (z/VSE) job number.
LPARNAME	Operating System Fields (OS)	The system LPAR or partition name (in z/OS or z/VSE environments) or the environment name from the job information macro (in BS2000 environments).
MONAME	Interval and Time Fields (IT)	The name of the month when the Adabas command was processed.
MONTH	Interval and Time Fields (IT)	The number of the month when the Adabas command was processed.
NATAPPL	Natural Fields (NAT)	The Natural application name (or library) to which the user issued a LOGON. This field does not necessarily show the library of the Natural object from which the Adabas call is issued. Under SQL, this field contains the library name.
NATCLTID	Natural Fields (NAT)	`NATCLTID` displays the client user ID of a user using a Natural server. `NATCLTID` only contains a value if an RPC client request is executed in a Natural RPC server session. In all other cases the field is empty.
NATCOUNT	Natural Fields (NAT)	The total number of Adabas calls generated by the user application since the last terminal I/O.
NATEXEC	Natural Fields (NAT)	The number of times a Natural object that issues Adabas calls has been executed. NATEXEC is "1" if the Natural object has issued an Adabas call for the first time on this level; for each subsequent Adabas call on this level the value will be set to zero. You can use the SUM statement to total the values of this field to obtain the total number of times a specific Natural object has been called.
NATGRP	Natural Fields (NAT)	The current Natural security group to which the user belongs.
NATLEVEL	Natural Fields (NAT)	The Natural call level of the Natural program issuing the Adabas call. For example, a CALLNAT routine that is called from a program and issues an Adabas call has a Natural level of 2.
NATLIB	Natural Fields (NAT)	The name of the Natural library where the object is located that is currently executed.
NATPROG	Natural Fields (NAT)	The name of the Natural program that issued the Adabas call. When Natural internally issues Adabas calls to load Natural objects, this value is not updated. Under SQL, this field contains the program name.
NATRPCCO	Natural Fields (NAT)	The 16-byte alphanumeric value for the store clock value used as identification of the Natural RPC Server.
NATRPCID	Natural Fields (NAT)	The 16-byte alphanumeric value of the conversation ID from the Natural RPC Server.

Field Name	Category	Description
NATSTMT	Natural Fields (NAT)	The Natural statement number where the Adabas command is processed. This line number is the line in the Natural program displayed by NATPROG. When the processed Adabas command is in the copy code portion of the Natural program, the line number refers to the copy code. The name of the copy code is not available at this time.
NATUID	Natural Fields (NAT)	The name of the Natural library to which the user is currently logged on. This is the value of the Natural system variable *APPLIC-ID.
NUCID	Adabas Nucleus Fields (NUC)	The ID of an Adabas nucleus in an Adabas Parallel Services or Adabas Cluster Services environment.
OP1	Adabas Control Block Fields (CB)	Corresponds to the ACB field `command option 1`. The contents of this field is determined by the command being issued.
OP2	Adabas Control Block Fields (CB)	Corresponds to the ACB field `command option 2`. The contents of this field is determined by the command being issued.
OPSYSNAM	Operating System Fields (OS)	The operating system name (SYSNAME) that is specified in the SYS1.PARMLIB and which will be obtained from the CVT (in z/OS environments) or the operating system name and version number (in BS2000 environments).
ORGDURA	Adabas Command Log Fields (CLOG)	The (original) value of the "duration" field contained in the command log record. The time is expressed in units of 16 microseconds.
QUARTER	Interval and Time Fields (IT)	The quarter of the year in which the Adabas command was processed.
ROUTDURA	Operating System Fields (OS)	The amount of time between the time a command was issued by the application and the time it was queued in the Adabas command queue. For Adabas 8.1 and earlier, this field is expressed in seconds; for Adabas 8.2 and later releases, this field is expressed in milliseconds. The ROUTDURA and ROUTTIME fields are alternate names for the same data; you can use either field in your reports.
ROUTTIME	Operating System Fields (OS)	Alternate name for ROUTDURA.
RSP	Adabas Control Block Fields (CB)	Corresponds to the ACB field `response code`. A response code of 0 indicates that the command executed successfully. This name is used in the schema portion of the **summary record**.
RSPSUB	Adabas Control Block Fields (CB)	Contains the Adabas response code subcode from the ACB field `Additions 2` or the ACBX field `ACBXERRC` for certain nonzero Adabas response codes.
SECGID	Transaction Processing Monitor Fields (TP)	Contains the security system group ID for the user who issued the Adabas call. This field is available under z/OS when the user is running with an external security system (RACF, ACF2, or Top Secret).

Field Name	Category	Description
SECUID	Transaction Processing Monitor Fields (TP)	Contains the security system user ID for the user who issued the Adabas call. This field is available under z/OS when the user is running with an external security system (RACF, ACF2, or Top Secret).
SEQ	Adabas Command Log Fields (CLOG)	The Adabas command sequence number. The value is incremented by one for each Adabas command processed.Fields SEQ and SEQUENCE are alternate names for the same data; you can use either field in your reports.
SEQUENCE	Adabas Command Log Fields (CLOG)	The Adabas command sequence number. The value is incremented by one for each Adabas command processed.Fields SEQ and SEQUENCE are alternate names for the same data; you can use either field in your reports.
SRCHTYPE	Adabas Command Log Fields (CLOG)	The type of search or search algorithm. This field contains one of the following values if the Adabas command log is for version 8.2 SP2 or later: ■ ALGO-1: Search algorithm 1 was used. ■ ALGO-2: Search algorithm 2 was used. ■ ALGO-3: Search algorithm 3 was used. ■ ALGO-4: Search algorithm 4 was used. ■ MIXED: A nondescriptor search combined with a descriptor search was used. ■ NONDES: A nondescriptor search occurred. If the Adabas command log is for an older Adabas release (8.2 SP1 or earlier), the value of the SRCHTYPE field will be blank.
STEPNAME	Operating System Fields (OS)	The name of the job step or task step that issued the Adabas call. This step is only available in z/OS environments.
STRTDATE	Interval and Time Fields (IT)	The date (in YYYY-MM-DD format) when the first Adabas command was processed within the current report control break.
STRTTIME	Interval and Time Fields (IT)	The time (in 24-hour format) when the first Adabas command was processed within the current report control break.
THDURA	Adabas Control Block Fields (CB)	The active thread time for a command. This is the time, in milliseconds, required to process the Adabas call, not including the wait time caused by I/O or other required resources. The value of this field is obtained from the command time field in the Adabas command log (LOX1CTME).
THTIME	Adabas Control Block Fields (CB)	Alternate name for THDURA.
TID	Transaction Processing Monitor Fields (TP)	The Com-plete terminal ID number of the user who issued the Adabas call.
TIME	Interval and Time Fields (IT)	The time (in 24-hour format) when the first Adabas call was processed.

Field Name	Category	Description
TOTDURA	Interval and Time Fields (IT)	Total duration. Contains the amount of time the command was in the Adabas thread plus the amount of time the command waited in the command queue. The TOTDURA field is the sum of the ADADURA and CQDURA field values expressed in seconds.
TPTRANNM	Transaction Processing Monitor Fields (TP)	The transaction number as established by the user's TP system for the transaction that issued the Adabas call.
TPUSERID	Transaction Processing Monitor Fields (TP)	The user ID on the TP monitor from which the Adabas call was issued.
TRANSID	Transaction Processing Monitor Fields (TP)	The name of the root transaction or program that issued the Adabas call.
TRUENAME	Transaction Processing Monitor Fields (TP)	The name of the Adabas CICS link routine TRUE exit.
UCMPRECL	Adabas Control Block Fields (CB)	Uncompressed record length. The uncompressed length of the Adabas format or search buffer field.
UOWID	Transaction Processing Monitor Fields (TP)	Contains the instance number and the sequence number of the CICS field NETUOWID, which is 27 bytes long. This field can only be filled in by CICS. The evaluation of this field requires a large amount of CPU time and, therefore, can only be activated by a special zap. Following is a description of the bytes in NETUOWID: ■ Offset 0 (Length 1): The length (L) of the Logical-Unit-of-Work-Identifier-Field, not including this field. The NETUOWID contains Logical-Unit-of-Work-Identifier-Field plus padding bytes. Values: 0 or 10 < = L < = 26. ■ Offset 1 (Length 1): The length of Network Name, not including this field, m = L - 9 , 1 < = m < = 17. ■ Offset 2 (Length m): Network name, format: ABCDEFGH.ABCDEFGH, Networkid.Luname. ■ Offset m + 2 (Length 6): Instance number. ■ Offset m + 2 + 6 (Length 2): Sequence number. ■ Offset m + 2 + 6 + 2 (Length until 27): Residual data.
USERID	Adabas Command Log Fields (CLOG)	The 28-byte Adabas communication ID of the user for whom the command was processed.
USERTYPE	Transaction Processing Monitor Fields (TP)	The type of TP system from which the Adabas call was issued. For example, if the Adabas call was issued from a CICS session, the USERTYPE field contains "CICS".
WEEK	Interval and Time Fields (IT)	The week number of the week in which the Adabas command was processed.
WEEKDAY	Interval and Time Fields (IT)	The name of the day on which the Adabas command was processed.

Field Name	Category	Description
YEAR	Interval and Time Fields (IT)	The year (in YYYY format) in which the Adabas command was processed.

Adabas Review Duration Field Derivations

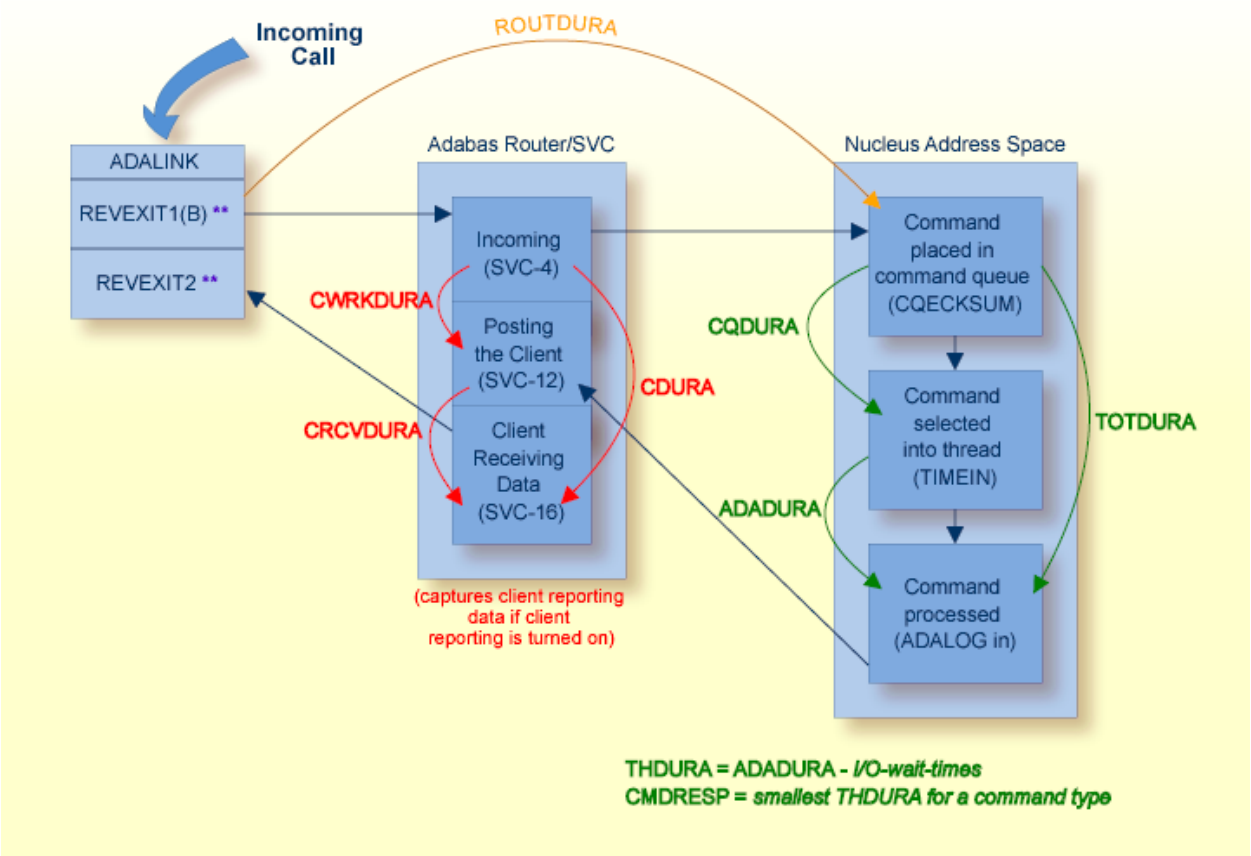
In Adabas Review, fields containing times as well as durations are recorded. Time fields represent the time of day at which something occurred; duration fields are calculated and represent the length of time it took a process to occur. The following duration fields are calculated by Adabas Review processing.

Field System Name	Category	Field Length	Format	Alternate Names	Description
ADADURA	IT	4	B	---	Adabas duration. Corresponds to the DURATION field. This field contains the amount of time (in seconds) that the command spent in the Adabas thread, including the time spent waiting for the completion of I/O operations. The ADADURA field differs from the DURATION and ORGDURA fields in that the time is computed to 6 decimal places instead of 4 decimal places.
CDURA	CMON	8	B	---	The total client duration time. This is the total time (in seconds) in which the client waits for the command to be processed by the server and the time it takes the ADALNK portion of the client to retrieve the command results. CDURA is the sum of the CRCVDURA and CWRKDURA fields. Measurement for this field starts immediately after the command is passed to the server (when it is posted from the Adabas link routine to the Adabas address space and SVC-4 router processing is performed). Measurement stops when the client picks up the command result information from the server (performing SVC-16 router processing within the Adabas link routine).
CMDRESP	CB	4	B	CMDRSP MCR	The time, in milliseconds, required to process the Adabas call. In the command table, Adabas Review stores the minimum Adabas duration for each command type returning a zero response code. The command table is updated whenever a lower duration value is encountered. Command response time is thus based on the command time field in the Adabas command log.

Field System Name	Category	Field Length	Format	Alternate Names	Description
					The values for CMDRESP in the history file are automatically stored in seconds. To display them correctly, they must be converted to milliseconds. For more information on this conversion, read *Migration from Previous Versions* , in the *Adabas Review Release Notes*. If you need to continue using the old scale and the old calculation algorithm for history data, contact your Software AG support representative. Due to changes in the display programs in SYSREVDB, you cannot use SYSREVDB in Adabas Review 4.4 (or earlier versions) to display the field contents of CMDRESP correctly, unless you stay with the old scale and algorithm.
CQDURA	**IT**	4	B	---	Command queue duration. Contains the amount of time (in seconds) that a command waited in the command queue before being dispatched into an Adabas thread.
CRCVDURA	**CMON**	8	B	---	The client receive time. This is the time (in seconds) it takes the Adabas link routine to retrieve a processed command from the server. Measurement for this field starts immediately after the server posts the Adabas link routine to retrieve the command result information (performing SVC-12 router processing) . Measurement stops when the Adabas link routine retrieves the command information from the server address space (performing SVC-16 router processing).
CWRKDURA	**CMON**	8	B	---	The client wait time, or the time in which the server works for the client. This is the time (in seconds) in which the client waits for the command to be processed by the server. Measurement for this field starts immediately after the command is passed to the server for processing (when it is posted from the Adabas link routine to the Adabas address space and SVC-4 processing is performed). Measurement stops when the Adabas link routine retrieves the command information from the server address space (performing SVC-12 router processing).
ESTCPU	**IT**	6.6	N	---	The estimated CPU time used by each Adabas command. The values shown in this field are only relative approximations of the CPU time used; they are

Field System Name	Category	Field Length	Format	Alternate Names	Description
					not based on any actual CPU times and are calculated, instead, based on an algorithm. The algorithm used varies for each Adabas command type and is based on the number of instructions, I/Os, descriptors, and fields used. This field can be used as a SUM, MIN, MAX and/or AVG field.
ROUTDURA	**OS**	8	B	ROUTTIME	The amount of time between the time a command was issued by the application and the time it was queued in the Adabas command queue. For Adabas 8.1 and earlier, this field is expressed in seconds; for Adabas 8.2 and later releases, this field is expressed in milliseconds.
THDURA	**CB**	8	B	THTIME	The active thread time for a command. This is the time, in milliseconds, required to process the Adabas call, not including the wait time caused by I/O or other required resources. The value of this field is obtained from the command time field in the Adabas command log (LOX1CTME).
TOTDURA	**IT**	4	B	---	Total duration. Contains the amount of time the command was in the Adabas thread plus the amount of time the command waited in the command queue. The `TOTDURA` field is the sum of the `ADADURA` and `CQDURA` field values expressed in seconds.

The following diagram depicts how these duration fields are calculated by Adabas Review:



**: The REVEXIT entry points REVEXIT1 (formerly REVEXITB) and REVEXIT2 are generated and linked to the ADALNK link routine when you install the components of Adabas Review that depend on a particular TP monitor. For more information, read about installation phase 2 in your Adabas Review installation documentation.

3 Supplied Report Reference

This section describes the reports supplied with Adabas Review. These reports may be used without modification, or they may be customized to suit individual site requirements.

The documentation for each report lists the fields (**system names**), report options, and report processing rules (if any) used to produce the report. To examine these report definitions online, read *Editing Existing Reports* in the *Adabas Review User's Guide*.

Application File Field Usage Report

The Application File Field Usage report shows the processing activity, by file, for Natural application programs. Processing activity information includes the total number of commands and I/Os, as well as the total amount of command response time (CMDRESP) and time used to process in the Adabas thread (ADADURA).

```
20:50:35                APPLICATION FILE FIELD USAGE                2009-06-18
                          2009-06-18 Thru 2009-06-18                 HUB=15690
                                                                     Page:    1
                             Total        Total         Total
NAT-Appl  File  Fld-Name  Num-of-IOs     Commands      Cmd-Resp
--------  ------ -------- ------------ ------------ --------------

              0                      0           34       0.113408
             50                      0           85       6.183168
             50 AB                   0           14       4.649984
             50 AI                   0            5       2.564480
             50 AK                   0            5       2.564480
             50 AL                   0            5       2.564480
             50 AM                   0            5       2.564480
             50 AN                   0            5       2.564480
             50 AZ                   0            5       2.564480
             50 OA                   0          163      12.200576
             50 OB                   0           15       1.862784
             50 OC                   0          101       7.873152
             50 OD                   0          103       8.088064

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help        Exit                          +               ===>  Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
NATAPPL	1							
FILE	2							
FBFIELDS	3							
IOS		Y						
COMMANDS		Y						
CMDRESP		Y						
ADADURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

None.

Adabas Buffer Pool Display Report

The Adabas Buffer Pool Display Report shows the usage of Adabas buffer pools.

```
22:31:56                  A D A B A S  -  R E V I E W                2009-06-19
                          ADABAS Buffer Pool Display                  HUB=15690

 nnnnK  = Buffer Size ------- = Max Used ======= = Currently Used

   !   47003K                          29K       0K       0K       0K     602K
100%  ---45%-                       --605%-  ==605%=  ---45%-  ====7%=  --828%-
   !  -------                       -------  =======  -------  =======  -------
   !  -------                       -------  =======  -------  =======  -------
 75%  -------                       -------  =======  -------  =======  -------
   !  -------                       -------  =======  -------  =======  -------
   !  -------                  19K  -------  =======  -------  =======  -------
 50%  -------              ---50%-  -------  =======  -------  =======  -------
   !  -------              -------  -------  =======  -------  =======  -------
   !  -------              -------  -------  =======  -------  =======  -------
 25%  -------              -------  -------  =======  -------  =======  -------
   !  -------              -------  -------  =======  -------  =======  -------
   !  -------    33224K  ===10%=  ====1%=  =======  -------  =======  -------
  0%-------------------------------------------------------------------------
       AB-POOL  COMMAND  HOLD     USER     ISN TAB  SEQ TAB  FORMAT   WORK

Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help        Exit                                                 Menu   ↩
```

Command Logging Report

The Command Logging report is a detailed report that contains the necessary report options for using the command logging features of Adabas Review. It may be used as an example for creating reports that perform command logging. For more information about the use of the command logging report options, refer to the section *Logging Options*, in the *Adabas Review User's Guide*.

The following report options are required for command logging and are used in this report:

Detail/Sum	D
Print	N
Log	Y
File	name
Num of Logs	number
Log Size	number

A command log report must be a detailed report so that it produces a straight recording of each command processed by Adabas.

Data fields are not used in reports that perform command logging. Because it is a detailed report and cannot be viewed online, and because the PRINT option is set to "N", field information entered on the Edit Report screen produces no effect.

The following report options used in this report are *not* required for command logging:

AutoStart	Y
Log FB	Y
Log SB	Y
Log RB	Y
Log VB	Y
Log IB	Y
Log IO	Y

Commands By Hour Report

The Commands by Hour report shows Adabas processing activity, by command, on an hourly basis. The processing activity shown includes the total number of commands, the total and average number of I/Os, and the total command response time.

```
03:39:06                        COMMANDS BY HOUR                        2009-06-20
                 03:37:16 2009-06-20 Thru 03:38:58 2009-06-20            HUB=15690
                                                                         Page:    1
              Total         Total          Total           Avg
Time  Cmd  Num-of-IOs     Commands      Cmd-Resp     Num-of-IOs
----- --- ------------- ------------ -------------- -------------

03:00 L3              0           12       0.998400         0.000
      RC              0            2       0.003584         0.000
      S1              0           28       3.218432         0.000
***** ***             0           42       4.220416         0.000
***** ***             0           42       4.220416         0.000

*****   E N D    O F    R E P O R T   *****




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +               ===>  Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
HOUR	1							
CMD	2							
IOS		Y			Y			
COMMANDS		Y						
CMDRESP		Y			Y			

Report Options Selected

```
AUTOSTART = Y
MAX K = 8
```

Report Processing Rules

None.

Cost Accounting Example Report

The Cost Accounting Example report is a summary report designed to show how Adabas Review may be used to produce cost accounting reports about Adabas resource consumption.

For more information about this report, see the section *Cost Accounting Example*, in *Adabas Review Concepts Manual*.

Descriptor Usage Report

The Descriptor Usage Report shows processing done for Adabas fields used as descriptors. Commands are shown with the descriptor name for the field on which the command was performed. Processing statistics are given for each command, whether or not the command was performed on a descriptor.

```
03:41:00                    DESCRIPTOR USAGE REPORT                    2009-06-20
                 03:37:25 2009-06-20 Thru 03:40:29 2009-06-20          HUB=15690
                                                                       Page:    1
                          Total         Total          Total          Total
 File  Cmd Desc-Name  Num-of-IOs     Commands       ADA-Dur         ISN-Qty
------ --- --------- ------------ ------------ ---------------- -------------

     0 RC                       0            3         0.000336             0
****** *** *********            0            3         0.000336             0
    50 L3  01                   0           12         0.000592             0
       S1                       0            2         0.000416             2
       S1  01                   0           25         0.005552            25
       S1  T1                   0            1         0.000304             1
****** *** *********            0           40         0.006864            28
****** *** *********            0           43         0.007200            28

*****   E N D    O F    R E P O R T   *****




Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +                      Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
FILE	1							
CMD	2							
SBFIELDS	3							
IOS		Y						
COMMANDS		Y						
ADADURA		Y						
ISNQ		Y						

Report Options Selected

Defaults.

Report Processing Rules

None.

Exceptional Response Codes Report

The Exceptional Response Codes report gives a snapshot of the processing environment at the time that an Adabas command returns an exceptional response code. (Response codes are exceptional if they are *not* equal to 0, 3, 9, 17, or 48.) The information collected by this report may be used to help determine the cause and resolve the condition causing the exceptional response code.

```
11:27:13                  EXCEPTIONAL RESPONSE CODES                2003-07-07
                    10:50:09 1999-06-23 Thru 10:54:51 1999-06-23    LOCL=00009

   Seq     CQ-Job  TPUserid NAT-Appl NAT-Pgm  NAT-Stmt Cmd File Rsp Rspsub
--------- -------- -------- -------- -------- -------- --- ---- ----------
   203871 COMPLETE USER1    PAA      MGLNVAUD 3110     L4    63  113   0
   204158 COMPLETE USER2    PAA      MGLNVAUD 3110     L4    63  113   0
   204689 COMPLETE USER3    PAA      MGLNVAUD 3110     L4    63  113   0
********* ******** ******** ******** ******** ******** *** **** **********
*****   E N D    O F    R E P O R T   *****

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit                          +               ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQ	1							
CQJOB	2							
TPUSERID	3							
NATAPPL	4							
NATPROG	5							
NATSTMT	6							
CMD	7							
FILE	8							
RSP	9							
RSPSUB	10							
IOS	11							
ADADURA	12							
CID	13							

Report Options Selected

```
AUTOSTART = Y
```

Report Processing Rules

```
RSP  NE  (0,3,9,17,48)
```

File Usage Report

The File Usage report breaks down file usage into the types of processing done to the file. It shows the total number of associator and data storage I/Os executed, the descriptor updates performed, the command response time used, the amount of Adabas processing time required, and the total number of commands.

```
03:43:13                          FILE USAGE                            2009-06-20
                 03:37:35 2009-06-20 Thru 03:42:23 2009-06-20            HUB=15690
                                                                        Page:    1
           Total         Total         Total         Total         Total
 File    Asso-IOs      Data-IOs      Commands     Desc-Upd      Cmd-Resp
------ ------------ ------------ ------------ ------------ --------------

     0            0            0            4            0       0.007168
    50            0            0           38            0       3.986944
******            0            0           42            0       3.994112

*****   E N D    O F    R E P O R T   *****
```

```
Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +               ===>  Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
FILE	1							
ASSOIO		Y						
DATAIO		Y						
COMMANDS		Y						
DESUPD		Y						
CMDRESP		Y						
DURATION		Y						

Report Options Selected

Defaults.

Report Processing Rules

None.

Hourly Database Overview Report

The Hourly Database Overview report shows the processing done in the database which is currently selected, on an hourly basis. It gives the total number of commands and I/Os, the total and average command response time (CMDRESP), and the average Adabas thread processing time (ADADURA).

```
04:08:00                    HOURLY DATABASE OVERVIEW                    2009-06-20
                 03:37:42 2009-06-20 Thru 04:07:29 2009-06-20            HUB=15690
                                                                         Page:    1
                  Total         Total          Total           Total
Time   File   Num-of-IOs      Commands       Cmd-Resp         ADA-Dur
----- ------ ------------- ------------ -------------- ----------------

03:00      0             0           12       0.021504          0.001872
          50             0           51       5.481216          0.008976
***** ******             0           63       5.502720          0.010848
04:00      0             0            4       0.007168          0.000624
          50             0            8       0.919552          0.001840
***** ******             0           12       0.926720          0.002464
***** ******             0           75       6.429440          0.013312

*****   E N D    O F    R E P O R T   *****




Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +               ===>  Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
HOUR	1							
FILE	2							
IOS		Y						
COMMANDS		Y						
CMDRESP		Y			Y			
ADADURA		Y			Y			

Report Options Selected

Defaults.

Report Processing Rules

None.

I/O Count by Hour Report

The I/O Count by Hour report calculates and displays information on an hourly basis. It shows the total I/Os, and breaks them into totals for the associator, the data storage area, and the work area. Total number of commands is also shown. The processing rule "IOS GT 0" assures that reporting is on commands issuing at least one I/O.

```
11:35:38                        IO COUNT BY HOUR                        2003-07-07
                    10:32:13 1999-06-23 Thru 11:35:37 1999-06-23    LOCL=00009
           Total         Total          Total          Total          Total
Time        IOs         Commands      Asso-IOs       Data-IOs      Work-IOs
----- ------------ ------------ ------------ --------------------------
10:00          3913         2140          1862          1737           314
11:00          5245         2899          2554          2319           372
*****          9158         5039          4416          4056           686
*****   E N D    O F    R E P O R T   *****



Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit                          +                     Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
HOUR	1							
IOS		Y						
COMMANDS		Y						
ASSOIO		Y						
DATAIO		Y						
WORKIO		Y						

Report Options Selected

```
ENTRIES = 99999
```

Report Processing Rules

```
IOS  GT  0
```

I/O Summary... Reports

The two I/O summary reports, I/O Summary by RABN and ***I/O Summary by Volume***, may be used to determine the components against which I/Os are performed. For commands issuing at least one I/O, these reports list the Adabas component against which the I/O was performed, and either the Adabas relative block number or the volume serial number of the device.

- I/O Summary by RABN Report

- I/O Summary by Volume Report

I/O Summary by RABN Report

The I/O Summary by Volume report is an example of an I/O summary report.

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
IOCOMP	1							
IORABN	2							
COMMANDS		Y						

Report Options Selected

```
ENTRIES = 99999
```

Report Processing Rules

```
IOS  GT  0
```

I/O Summary by Volume Report

The I/O Summary by Volume report is an example of an I/O summary report.

```
11:36:43                      IO SUMMARY BY VOLUME                     2003-07-07
                    10:33:08 1999-06-23 Thru 11:36:42 1999-06-23    LOCL=00009
                              Total
 Volser IO-TYPE IO-Comp   Commands
 ------ ------- ------- ------------
 RD0008 ASSO    AC1             1172
        ASSO    AC2                7
        ASSO    AS               386
        ASSO    FCB              193
        ASSO    FDT              103
        ASSO    NI1             1704
        ASSO    UI1              881
        ASSO    UI2               12
        DATA    DS               161
        DATA    DS1             3562
        DATA    DS2              183
        DATA    DS3               37
        DATA    DS4              150
 Command: ____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit                          +                      Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
IOVOLSER	1							
IOTYPE	2							
IOCOMP	3							
COMMANDS		Y						

Report Options Selected

```
ENTRIES = 99999
```

Report Processing Rules

```
IOS  GT  0
```

Job Overview Report

The Job Overview report shows processing activity for jobs or tasks issuing Adabas calls. For the job or task, it shows the file number accessed, the total number of I/Os and commands, and the total command response time (CMDRESP) and Adabas thread processing time used (ADADURA).

```
03:55:38                          JOB OVERVIEW                            2009-06-20
                 03:38:08 2009-06-20 Thru 03:54:30 2009-06-20             HUB=15690
                                                                          Page:    1
                         Total         Total          Total           Total
 CQ-Job    File  Cmd  Num-of-IOs     Commands      Cmd-Resp         ADA-Dur
-------- ------ --- ------------- ------------ -------------- ----------------

 ?~??q         0 RC              0            8       0.014336          0.001184
              50 L3              0           12       0.998400          0.000592
              50 S1              0           26       2.988544          0.005344
******** ****** ***              0           46       4.001280          0.007120
******** ****** ***              0           46       4.001280          0.007120

*****   E N D    O F    R E P O R T   *****




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +                      Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
CQJOB	1							
FILE	2							
CMD	3							
IOS		Y						
COMMANDS		Y						
CMDRESP		Y						
ADADURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

None.

Last 500 Adabas Calls Report

The Last 500 Adabas Calls report lists the last 500 Adabas call in order by Adabas sequence number. This report uses the report option "DISPLAY BY=SORTEDDE" which lists the calls in order by sequence number, starting with the most recent sequence number first.

The order in which the sequence numbers are displayed may be changed by using a different "DISPLAY BY=" option. The number of calls shown can be varied from 500, by changing the "ENTRIES=" option to any number desired. For example, "ENTRIES=100" displays the last 100 Adabas calls.

```
03:57:18                    LAST 500 ADABAS CALLS                    2009-06-20
                 03:38:15 2009-06-20 Thru 03:57:07 2009-06-20         HUB=15690
                                                                      Page:    1

 Sequence  TPUserid NAT-Appl NAT-Pgm   File  Cmd Rsp     Total-Dur
 --------- -------- -------- -------- ---- --- ---- ----------------
    228047 USER1    SYS410DB SR-00038    0 RC     0         0.000304
    228046 USER1    SYS410DB SR-00038   17 L3     0         0.000864
    228045 USER1    SYS410DB SR-00038   17 L3     0         0.005328
    228044 USER1    SYS410DB SR-00038   17 L3     0         0.000512
    228043 USER1    SYS410DB SR-00038   17 L3     0         0.004272
    228042 USER1    SYS410DB SR-00038   17 L3     0         0.000640
    228041 USER1    SYS410DB SR-00038   17 L3     0         0.089600
    228040 USER2    SYS410DB P-DBLS      0 RC     0         0.000320
    228039 USER3    SYS410DB S-DBEXIT    0 ET     0         0.030048
    228038 USER3    SYS410DB S-DBEXIT   17 A1     0         0.029248
    228037 USER3    SYS410DB S-DBEXIT   17 S4     0         0.000768
    228036 USER3    SYS410DB S-DBEXIT   17 A1     0         0.026256
    228035 USER3    SYS410DB S-DBEXIT   17 S4     0         0.000544
 Command: ____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit                          +              ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQ	1							
TPUSERID	2							
NATAPPL	3							
NATPROG	4							
FILE	5							
CMD	6							
RSP	7							
TOTDURA	8							
IOS	9							

Report Options Selected

```
WRAPPING = Y
MAX K = 48
DISPLAY BY = SORTEDDE
ENTRIES = 500
```

Report Processing Rules

None.

Long Running Commands Report

The Long Running Commands report shows commands with a duration greater than three seconds and I/Os greater than 200.

The report processing rule "ADADURA GT 3.0" determines that commands with a duration greater than three seconds are selected for this report; to change the duration for the commands selected, change the number "3.0" to any number desired. Similarly, the report processing rule "IOS GT 200" selects commands with more than 200 I/Os; to change the I/O criterion for the commands selection, change "200" to any number desired.

```
11:54:53                      LONG RUNNING COMMANDS                  2003-07-07
                    09:52:56 1999-06-16 Thru 11:50:35 1999-06-16    LOCL=00009
    Seq     CQ-Job  TPUserid NAT-Appl NAT-Pgm  Cmd File Rsp       IOs
 --------- -------- -------- -------- -------- --- ---- ---- -------------
  13375591 COM000R  USER1    SYSCNT2  NIDES2   S1    65    0          389
  13377560 COM000R  USER2    SYSCNT2  NIDES2   S1    65    0          383
  13384954 COM000R  USER3    SYSCNT2  NIDES2   S1    65    0          393
  13390282 COM000R  USER4    SYSCNT2  NIDES2   S1    65    0          386
  13393597 COM000R  USER5    SYSCNT2  NIDES2   S1    65    0          388
  13404627 COM000R  USER6    SYSCNT2  NIDES2   S1    65    0          489
 ********* ******** ******** ******** ******** *** **** ****************
 *****   E N D    O F    R E P O R T   *****

 Command: ____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit                          +               ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQ	1							
CQJOB	2							
TPUSERID	3							
NATAPPL	4							
NATPROG	5							
CMD	6							
FILE	7							
RSP	8							
IOS	9							
ADADURA	10							
CID	11							

Report Options Selected

Defaults.

Report Processing Rules

```
ADADURA  GT  3.0  AND
IOS  GT  200
```

Natural Program Trace Report

The Natural Program Trace report shows processing activity for a specific Natural program, sorted by Adabas sequence number. To specify the program to be reported on, use the processing rules:

```
NATAPPL  EQ MYLOGON
```

where *MYLOGON* is the program library name; and

```
NATPROG  EQ MYPROG
```

where *MYPROG* is the program name.

Here is a sample of the report:

```
15:14:55                      NATURAL PROGRAM TRACE                    2003-07-07
                  14:12:56 1999-06-28 Thru 14:12:59 1999-06-28         LOCL=00009


   Seq    Cmd File Rsp    CID        ADA-Dur          Cmd-Resp         IOs
--------- --- ---- ---- -------- ---------------- -------------- -------------

   375126 L3    12    0 09700101         0.004672       0.000112            1
   375127 L3    12    0 09700101         0.003184       0.000112            0
   375128 L3    12    0 09700101         0.000384       0.000112            0
   375129 L3    12    0 09700101         0.000496       0.000112            0
   375130 L3    12    0 09700101         0.000384       0.000112            0
   375131 L3    12    0 09700101         0.000352       0.000112            0
   375132 L3    12    0 09700101         0.001456       0.000112            0
   375133 L3    12    0 09700101         0.000352       0.000112            0
   375134 L3    12    0 09700101         0.000352       0.000112            0
   375135 L3    12    0 09700101         0.000432       0.000112            0
   375136 L3    12    0 09700101         0.000528       0.000112            0
   375137 L3    12    0 09700101         0.000352       0.000112            0
   375138 S1     0   17 47550101         0.000048       0.000144            0

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit                          +                      Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
CMD	2							
FILE	3							
RSP	4							
CID	5							
ADADURA	6							
CMDRESP	7							

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
IOS	8							

Report Options Selected

Defaults.

Report Processing Rules

```
NATAPPL  EQ MYLOGON AND
NATPROG  EQ MYPROG
```

Natural Summary Report

The Natural Summary report shows processing activity for a Natural application on a program-by-program basis.

```
10:57:09                        NATURAL SUMMARY                        2010-06-24
                 10:56:59 2010-06-24 Thru 10:57:04 2010-06-24          HUB=00205
                                                                       Page:    1
                                  Total         Total          Total
NAT-Appl NAT-Pgm   File  Cmd  Num-of-IOs     Commands       Cmd-Resp
-------- -------- ------ --- ------------- ------------ --------------

SYSREVDB N--FKEYW      0 RC              0            1       1.000000
         N--FKEYW      8 L3              0            1       1.000000
         N--RPROF      0 RC              0            2       2.000000
         N--RPROF      8 L3              0            2       2.000000
         N--UPROF      8 S1              0            2       2.000000
         N-NTFILE      8 S1              0            2       2.000000
         P-DBLR        0 RC              0            3       3.000000
         P-DBLR        8 L3              0            1       1.000000
         P-DBLR        8 S1              1            2       2.000000
         P-DBLR       33 S1              0            1       1.000000
         P-DBLS        0 RC              0            1       1.000000
         P-DBLS        8 L3              0            1       1.000000
         P-DBLS        8 S1              0            1       1.000000

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
10:57:09                        NATURAL SUMMARY                          2010-06-24
                 10:56:59 2010-06-24 Thru 10:57:04 2010-06-24           HUB=00205

              Total
NAT-Appl     ADA-Dur
-------- ----------------

SYSREVDB         1.048576
                 1.048576
                 2.097152
                 2.097152
                 2.097152
                 2.097152
                 3.145728
                 1.048576
                 2.097152
                 1.048576
                 1.048576
                 1.048576
                 1.048576

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
NATAPPL	1							
NATPROG	2							
FILE	3							
CMD	4							
IOS		Y						
COMMANDS		Y						
CMDRESP		Y						
ADADURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

None.

Natural Transaction Trace Report

The Natural Transaction Trace report shows processing activity by transaction number using the `TPTRANNM` field. Data is broken down by Natural application and program name.

```
04:06:06                  NATURAL TRANSACTION TRACE                  2009-06-20
                 03:38:39 2009-06-20 Thru 04:05:15 2009-06-20         HUB=15690
                                                                      Page:    1
                                                 Total
 Trans Nr   NAT-Appl NAT-Pgm  File Cmd Rsp    Commands
----------- -------- -------- ---- --- ---- ------------
        140 SYS410DB P-DBST      0 RC     0            1
            SYS410DB P-DBST      0 S1    17            1
            SYS410DB S-DBEXIT    0 ET     0            1
********** ******** ******** **** *** ****            3
        141 SYS410DB S-ST241     0 ET     0            1
            SYS410DB S-ST241    17 A1     0            2
            SYS410DB S-ST241    17 S4     0            2
********** ******** ******** **** *** ****            5
        595 PAC13               15 L3     0           11
********** ******** ******** **** *** ****           11
        596 PAC13               15 L3     0           11
********** ******** ******** **** *** ****           11
        597 PAC13                0 RC     0            1
Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit                          +                     Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
TPTRANNM	1							
NATAPPL	2							
NATPROG	3							
FILE	4							
CMD	5							
RSP	6							
COMMANDS		Y						

Report Options Selected

Defaults.

Report Processing Rules

None.

PRILOG Report

The PRILOG Report duplicates the information provided by the PRILOG program, which is supplied with Adabas and is used to print command logs.

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
TIME	2							
DURATION	3							
CQJOB	4							
USERID	5							
CMD	6							
RSP	7							
CID	8							
FILE	9							
ISN	10							
THREAD	11							
PRI	12							
ASSOIO	13							

Report Options Selected

Defaults.

Report Processing Rules

None.

Rate of Commands and I/Os by Date Report

The Rate of Commands and I/Os by Date report calculates and displays the total and average rate of commands and I/Os by hour for a specific date.

```
12:30:37              RATE OF COMMANDS AND IOS BY DATE                2009-06-22
                 04:10:23 2009-06-20 Thru 12:29:51 2009-06-22          HUB=15690
                                                                       Page:    1
                     Total        Total        Rate      Rate
   Date    Time   Num-of-IOs     Commands   Num-of-IOs Commands
---------- ----- ------------ ------------ ---------- ---------

2009-06-20 04:00             0           41        0.0        0.0
********** *****             0           41
2009-06-22 12:00             0          174        0.0        0.0
********** *****             0          174
********** *****             0          215

*****   E N D    O F    R E P O R T   *****




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --          +                     Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
DATE	1							
HOUR	2							
IOS		Y					Y	
COMMANDS		Y					Y	

Report Options Selected

```
MAX K = 16
```

Report Processing Rules

None.

Rate of Commands and I/Os by Hour Report

The Rate of Commands and I/Os by Hour report calculates and displays the total and average rate of commands and I/Os by hour.

```
12:32:48              RATE OF COMMANDS AND IOS BY HOUR               2009-06-22
                 04:10:29 2009-06-20 Thru 12:32:14 2009-06-22         HUB=15690
                                                                     Page:    1
          Total         Total         Rate       Rate
Time   Num-of-IOs      Commands    Num-of-IOs Commands
----- ------------- ------------ ---------- ---------

 04:00            41           71        0.0        0.0
 05:00          2503         6040        0.7        1.7
 06:00          5189        12280        1.5        3.4
 07:00          3408         9674        1.0        2.8
 08:00         12024        39308        3.4       11.1
 09:00         10970        24753        9.9       22.3
 *****         34135        92126


 *****   E N D    O F    R E P O R T   *****



 Command: ____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit                          +                      Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
HOUR	1							
IOS		Y					Y	
COMMANDS		Y					Y	

Report Options Selected

Defaults.

Report Processing Rules

None.

Summary Report by File Report

The Summary Report by File shows Adabas processing activity by file number and file name. Within each file, command types are listed, showing the total number of this type of command, total and average I/Os, total and average Adabas thread processing time (ADADURA), and total and average command response time (CMDRESP).

```
12:34:51                    SUMMARY REPORT BY FILE                     2009-06-22
                 04:10:37 2009-06-20 Thru 12:34:40 2009-06-22          HUB=15690
                                                                       Page:    1
                                Total         Total          Total
 File     File Name     Cmd  Num-of-IOs     Commands       ADA-Dur
------ ---------------- --- ------------ ------------ ----------------

     0                  OP              0            1         0.096368
                        RC              0           24         0.002512
****** ***************** ***            0           25         0.098880
    50                  L3              0            1         0.000000
        ?USER  Reposito L1              0            1         0.000288
        ?USER  Reposito L3              0          165         0.035312
        ?USER  Reposito S1              0           28         0.014752
****** ***************** ***            0          195         0.050352
****** ***************** ***            0          220         0.149232

*****   E N D    O F    R E P O R T   *****



Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +               ===>  Menu   ↩
```

```
12:34:51                    SUMMARY REPORT BY FILE                     2009-06-22
                 04:10:37 2009-06-20 Thru 12:34:40 2009-06-22          HUB=15690

           Total           Avg            Avg             Avg
 File     Cmd-Resp     Num-of-IOs       ADA-Dur         Cmd-Resp
------ -------------- ------------ ---------------- --------------

     0       0.506112         0.000         0.096368       0.506112
             0.043008         0.000         0.000104       0.001792
             0.549120         0.000         0.003955       0.021964
    50       0.081920         0.000         0.000000       0.081920
             0.704768         0.000         0.000288       0.704768
            13.647872         0.000         0.000214       0.082714
             3.218432         0.000         0.000526       0.114944
            17.652992         0.000         0.000258       0.090528
            18.202112         0.000         0.000678       0.082736









Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +          <===        Menu   ↩
```

This section covers the following topics:

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
FILE	1							
FILENAME	2							
CMD	3							
IOS		Y			Y			
COMMANDS		Y						
ADADURA		Y			Y			
CMDRESP		Y			Y			

Report Options Selected

```
AUTOSTART = Y
MAX K = 8
```

Report Processing Rules

None.

Thread Activity Report

The Thread Activity report shows processing activity broken down for individual Adabas threads. Each thread number shows the total number of commands, the total and average number of I/Os, and the average amount of command processing time per command; i.e., the time the command spent in the command queue added to the Adabas command processing time (TOTDURA).

```
12:37:06                          THREAD ACTIVITY                          2009-06-22
                  04:10:46 2009-06-20 Thru 12:36:44 2009-06-22              HUB=15690
                                                                           Page:    1
           Total         Total          Avg            Avg
Thread  Num-of-IOs     Commands    Num-of-IOs      Total-Dur
------ ------------ ------------ ------------ ----------------
  1            12743        27843        0.457         0.011301
  2              470         1024        0.458         0.016938
  3              133          159        0.836         0.019639
******         13346        29026        0.459         0.011546
*****   E N D    O F    R E P O R T   *****



 Command: ____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit                          +                     Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
THREAD	1							
IOS		Y			Y			
COMMANDS		Y						
TOTDURA					Y			

Report Options Selected

Defaults.

Report Processing Rules

None.

Thread Activity by Command Report

The Thread Activity by Command report breaks thread activity down into command types, then shows the total number of commands, the total and average number of I/Os per command, and the total and average amount of command processing time per command.

```
12:42:29                 THREAD ACTIVITY BY COMMAND                 2009-06-22
               12:40:31 2009-06-22 Thru 12:42:13 2009-06-22          HUB=15690
                                                                     Page:    1
              Total        Total          Total           Total
Thread Cmd  Num-of-IOs     Commands      Total-Dur        ADA-Dur
------ --- ------------- ------------ ---------------- ----------------

  1    L3              0           18     65281.124466         0.002160
       RC              0            1      3840.066162         0.000144
       S1              0           36    138242.384728         0.008080
****** ***             0           55    207363.575356         0.010384
****** ***             0           55    207363.575356         0.010384

*****   E N D    O F    R E P O R T   *****




Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +               ===>  Menu   ↩
```

```
12:42:29                 THREAD ACTIVITY BY COMMAND                  2009-06-22
                12:40:31 2009-06-22 Thru 12:42:13 2009-06-22         HUB=15690

            Total            Avg            Avg             Avg
Thread      CQ Dur       Num-of-IOs      Total-Dur         ADA-Dur
------ --------------- ------------ --------------- ----------------

  1        65281.122306         0.000      3626.729137         0.000120
            3840.066018         0.000      3840.066162         0.000144
          138242.376648         0.000      3840.066242         0.000224
          207363.564972         0.000      3770.246824         0.000188
          207363.564972         0.000      3770.246824         0.000188









Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +          <===  ===>  Menu   ↩
```

```
12:42:29                 THREAD ACTIVITY BY COMMAND                  2009-06-22
                12:40:31 2009-06-22 Thru 12:42:13 2009-06-22         HUB=15690

             Avg
Thread      CQ Dur
------ ----------------

  1         3626.729017
            3840.066018
            3840.066018
            3770.246635
            3770.246635









Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --           +          <===        Menu   ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
THREAD	1							
CMD	2							
IOS		Y			Y			
COMMANDS		Y						
TOTDURA		Y			Y			
ADADURA		Y			Y			
CQDURA		Y			Y			

Report Options Selected

Defaults.

Report Processing Rules

None.

Transaction Count... Reports

For transaction numbers not equal to zero, the Transaction Count reports calculate and display the *total*:

- number of completed Adabas transactions for the user;
- number of commands performed for the transactions;
- number of I/Os performed for the transactions;
- amount of command processing time; i.e., the time Adabas spent to process the command, and the time the command spent in the command queue;
- amount of time spent by Adabas to process the command;
- amount of time the command spent in the command queue.

- Transaction Count by Job Report
- Transaction Count by Job-NATAPPL Report
- Transaction Count by Job-User Report

- Transaction Count by Natural Report

Transaction Count by Job Report

The Transaction Count by Job report is an example of a transaction count report.

```
17:58:55                    TRANSACTION COUNT BY JOB                  2003-07-07
                 04:50:58 1999-06-15 Thru 17:58:54 1999-06-15     LOCL=00009
             Total         Total          Total          Total
 CQ-Job   Trans-Cnt     Commands         IOs          Total-Dur
-------- ------------ ------------ ------------- ----------------
CICSPROD        35971       322386         169800      2751.100528
CICSTEST         1352        19816           8503       377.155664
USER1            1387        19958          10718       412.490496
USER2              59          604            192         5.377152
BATCHJOB            4          123             53         1.454592
TSOUSER3            4          144            104         3.208336
********        38777       363031         189370      3550.786768
*****   E N D    O F    R E P O R T   *****

Command: ____________________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit                          +               ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
CQJOB	1							
TPTRANCT		Y						
COMMANDS		Y						
IOS		Y						
TOTDURA		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

```
TPTRANNM  NE  0
```

Transaction Count by Job-NATAPPL Report

The Transaction Count by Job-NATAPPL report includes and sorts the transaction count report by job and Natural application name.

This section covers the following topics:

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
CQJOB	1							
NATAPPL	2							
TPTRANCT		Y						
COMMANDS		Y						
IOS		Y						
TOTDURA		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

```
TPTRANNM  NE  0
```

Transaction Count by Job-User Report

The Transaction Count by Job-User report includes and sorts the transaction count report by job and TP monitor user ID.

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
CQJOB	1							
TPUSERID	2							
TPTRANCT		Y						
COMMANDS		Y						
IOS		Y						
TOTDURA		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

```
TPTRANNM  NE  0
```

Transaction Count by Natural Report

The Transaction Count by Job-User report includes and sorts the transaction count report by Natural application name and program name.

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
NATAPPL	1							
NATPROG	2							
TPTRANCT		Y						
COMMANDS		Y						
IOS		Y						
TOTDURA		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

```
TPTRANNM  NE  0
```

Transaction Detailed Information Report

The Transaction Detailed Information report displays detailed processing information, by transaction number, for each transaction not equal to zero.

The processing rule "TPTRANNM NE 0" ensures that the transaction number will not be equal to zero.

Here is a sample report:

```
10:01:46               TRANSACTION DETAILED INFORMATION             2003-07-07
                  09:54:54 1999-06-26 Thru 09:56:18 1999-06-26      LOCL=00009

 Trans Nr      Seq    TPUserid Cmd File Rsp       IOs          ADA-Dur
----------- --------- -------- --- ---- ---- ------------ ----------------
         87     50967 USER1    RC     0    0            0        0.000080
********** ********* ******** *** **** **** ************ ****************
         88     50968 USER1    S4    17    0            0        0.000320
                50969 USER1    A1    17    0            0        0.000288
                50970 USER1    S4    17    0            0        0.000464
                50971 USER1    A1    17    0            0        0.002064
                50972 USER1    ET     0    0            1        0.000064
********** ********* ******** *** **** **** ************ ****************
         89     51005 USER2    S4    17    0            0        0.000384
                51006 USER2    A1    17    0            0        0.000400
                51007 USER2    S4    17    0            0        0.000288
                51008 USER2    A1    17    0            1        0.031280
                51009 USER2    ET     0    0            1        0.000064
Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit                          +               ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
TPTRANNM	1							
SEQUENCE	2							
TPUSERID	3							
CMD	4							
FILE	5							
RSP	6							
IOS	7							
ADADURA	8							
CMDRESP	9							
CQJOB	10							
COMMANDS	11							

Report Options Selected

```
MAX K = 32
```

Report Processing Rules

```
TPTRANNM  NE  0
```

Transaction Summary by User Report

Similar to the Transaction Count reports, the Transaction Summary by User calculates and displays information about a user's TP transaction for transaction numbers not equal to zero.

The processing rule "TPTRANNM NE 0" ensures that the transaction number will not be equal to zero.

Here is a sample report:

```
10:02:16                  TRANSACTION SUMMARY BY USER                2003-07-07
                 09:55:25 1999-06-26 Thru 10:01:21 1999-06-26      LOCL=00009
                          Total        Total          Total
 TPUserid  Trans Nr         IOs        Commands      Total-Dur
 -------- ----------- ------------ ------------ ----------------
 USER1            654            4            4          0.048944
                  655           11           11          0.218096
                  656            2            4          0.048512
 ******** ***********           17           19          0.315552
 USER2            552           12            9          0.211936
                  553            4            3          0.108320
                  554            3            1          0.105456
                  555            4            2          0.103792
                  556            4            2          0.125264
                  557            3            3          0.076016
                  558            0            3          0.005376
 ******** ***********           30           23          0.736160
 USER3           2280            5           11          0.100288
 Command: ____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit                          +               ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected

- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
TPUSERID	1							
TPTRANNM	2							
IOS		Y						
COMMANDS		Y						
TOTDURA		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

```
MAX K = 16
```

Report Processing Rules

```
TPTRANNM  NE  0
```

Who is Using Natural? Report

The Who is Using Natural? report shows processing activity broken down by the individual user. Users are identified by their TP user ID.

```
10:51:51                    WHO IS USING NATURAL                    2010-06-24
                10:51:40 2010-06-24 Thru 10:51:50 2010-06-24         HUB=00205
                                                                     Page:    1
                                          Total        Total
TPUserid NAT-Appl NAT-Pgm   File  Cmd  Num-of-IOs     Commands
-------- -------- -------- ------ --- ------------ ------------

XXX      SYSREVDB N-CHKMN       0 RC              0            8
         SYSREVDB N-CHKMN       8 L3              0            8
         SYSREVDB N-CHKMN       8 S1              0            8
         SYSREVDB N-NTFILE      8 S1              0            2
         SYSREVDB P-DBER        0 RC              0            5
         SYSREVDB P-DBER        8 L3              0            5
         SYSREVDB P-DBER        8 S1              0            6
         SYSREVDB P-DBLR        0 RC              0            3
         SYSREVDB P-DBLR        8 L3              0            1
         SYSREVDB P-DBLR        8 S1              0            1
         SYSREVDB P-DBLR       33 L3              0           36
         SYSREVDB P-DBLS        0 RC              0            1
         SYSREVDB P-DBLS        8 L3              2            1

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
10:51:51                    WHO IS USING NATURAL                    2010-06-24
                10:51:40 2010-06-24 Thru 10:51:50 2010-06-24         HUB=00205

             Total           Total
TPUserid    Cmd-Resp        ADA-Dur
-------- -------------- ----------------

XXX            8.000000         8.388608
               8.000000         8.388608
               8.000000         8.388608
               2.000000         2.097152
               5.000000         5.242880
               5.000000         5.242880
               6.000000         6.291456
               3.000000         3.145728
               1.000000         1.048576
               1.000000         1.048576
              36.000000        37.748736
               1.000000         1.048576
               1.000000         1.048576

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu    ↩
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
TPUSERID	1							
NATAPPL	2							
NATPROG	3							
FILE	4							
CMD	5							
IOS		Y						
COMMANDS		Y						
CMDRESP		Y						
ADADURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

None.

Who Uses SYSMAIN? Report

The Who Uses SYSMAIN? report shows jobs which are using SYSMAIN. The job name is shown, listing the individual users, denoted by the user's TP user ID.

The report processing rule "NATAPPL EQ SYSMAIN" assures that only jobs using SYSMAIN are shown. This processing rule may be modified to equal any Natural application name.

Here is a sample report:

```
10:05:06                        WHO USES SYSMAIN                        2003-07-07
                  09:57:38 1999-06-26 Thru 09:57:41 1999-06-26      LOCL=00009
                              Total         Total         Total
 CQ-Job  TPUserid File    Cmd-Resp      Commands        IOs
-------- -------- ---- -------------- ------------ -------------
COMPLETE USER1       0       0.000784           48             1
         USER1      15       0.000672            6             2
         USER1      16       0.000304            3             7
         USER1      17       0.011056          105            70
         USER1      18       0.001280            6            10
******** ******** ****       0.014096          168            90
******** ******** ****       0.014096          168            90
*****   E N D    O F    R E P O R T   *****

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit                          +               ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
CQJOB	1							
TPUSERID	2							
FILE	3							
CMDRESP		Y						
COMMANDS		Y						
IOS		Y						
ADADURA		Y						

Report Options Selected

Defaults.

Report Processing Rules

```
NATAPPL  EQ  SYSMAIN
```

Worst Calls... Reports

The six Worst Calls reports list and calculate information about the 100 "worst" Adabas calls. Each report rates its commands according to certain criteria:

Worst Calls by ...	Selects the 100 calls that ...
ADADURA	required the most Adabas processing time, and calculates a total for Adabas processing time.
CQDURA	spent the longest time in the command queue, and calculates a total for command queue duration.
DESCUPD	required the most descriptor updates, and calculates the total number of descriptor updates.
IOS	caused the most I/O operations to be performed, and calculates the total number of I/Os.
ISNQ	required the most ISNs, and calculates the total number of ISNs.
TOTDURA	required the longest processing time (i.e., time in the command queue and Adabas processing time) and calculates a total for processing time.

Worst Calls by ADADURA Report

The Worst Calls by ADADURA report is an example of a Worst Calls report.

```
11:48:29                  WORST CALLS BY-> ADADURA                    2010-06-24
                11:48:22 2010-06-24 Thru 11:48:28 2010-06-24        LOCL=00204
                                                                    Page:    1

 Sequence    CQ-Job  TPUserid NAT-Appl NAT-Pgm  Cmd  File      ADA-Dur
----------- -------- -------- -------- -------- --- ------ ----------------

        123 XXX      XXX      SYSREVDB SR-00016 V4       0         0.000000
        122 XXX      XXX      SYSREVDB SR-00016 S1       8         0.000071
        121 XXX      XXX      SYSREVDB SR-00016 S1       8         0.005856
        120 XXX      XXX      SYSREVDB P-DBVWRT RC       0         0.000384
        119 XXX      XXX      SYSREVDB P-DBVWRT RC       0         0.000065
        118 XXX      XXX      SYSREVDB P-DBVWRT L3       8         0.006766
        117 XXX      XXX      SYSREVDB P-DBVWRT S1       8         0.000104
        116 XXX      XXX      SYSREVDB USR1029N RC       0         0.000119
        115 XXX      XXX      SYSREVDB USR1029N L3       8         0.014382
*********** ******** ******** ******** ******** *** ****** ****************

*****   E N D    O F    R E P O R T   *****


Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
11:48:29                  WORST CALLS BY-> ADADURA                    2010-06-24
                11:48:22 2010-06-24 Thru 11:48:28 2010-06-24        LOCL=00204

                                          Total          Total
 Sequence    Num-of-IOs      Cmd-Resp    ADA-Dur        Commands
----------- ------------ -------------- ---------------- ------------

        123            0       0.000000         0.000000            1
        122            0       0.044000         0.000071            1
        121            2       0.151750         0.005856            1
        120            0       0.007500         0.000384            1
        119            0       0.007625         0.000065            1
        118            9       0.761750         0.006766            1
        117            0       0.049000         0.000104            1
        116            0       0.008000         0.000119            1
        115            4       0.406875         0.014382            1
           ************ **************         0.027747            9




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
CQJOB	2							
TPUSERID	3							
NATAPPL	4							
NATPROG	5							
CMD	6							
FILE	7							
ADADURA	8	Y						
IOS	9							
CMDRESP	10							
COMMANDS		Y						

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

Worst Calls by CQ DURA Report

The Worst Calls by CQ DURA report is an example of a Worst Calls report.

```
12:08:15                  WORST CALLS BY-> CQ DURA                    2010-06-24
                 12:08:10 2010-06-24 Thru 12:08:14 2010-06-24         LOCL=00204
                                                                      Page:    1

 Sequence    CQ-Job  TPUserid NAT-Appl NAT-Pgm  Cmd  File       CQ Dur
---------- -------- -------- -------- -------- --- ------ ----------------

        277 XXX      XXX      SYSREVDB SR-00014 V4       0         0.000000
        276 XXX      XXX      SYSREVDB SR-00014 S1       8         0.000384
        275 XXX      XXX      SYSREVDB SR-00014 S1       8         0.000080
        274 XXX      XXX      SYSREVDB P-DBLS   RC       0         0.000032
        273 XXX      XXX      SYSREVDB P-DBLS   RC       0         0.000288
        272 XXX      XXX      SYSREVDB P-DBLS   L3       8         0.000160
        271 XXX      XXX      SYSREVDB P-DBLS   S1       8         0.000064
********** ******** ******** ******** ******** *** ****** ****************

*****   E N D    O F    R E P O R T   *****




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
 12:08:15                  WORST CALLS BY-> CQ DURA                    2010-06-24
                  12:08:10 2010-06-24 Thru 12:08:14 2010-06-24         LOCL=00204

                                                 Total
  Sequence       ADA-Dur       Num-of-IOs        CQ Dur
 ---------- ---------------- ------------ ----------------

         277         0.000000            0         0.000000
         276         0.000487            0         0.000384
         275         0.000167            0         0.000080
         274         0.000027            0         0.000032
         273         0.000319            0         0.000288
         272         0.013165            7         0.000160
         271         0.009379            1         0.000064
             ***************** *************         0.001008









 Command: _____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
CQJOB	2							
TPUSERID	3							
NATAPPL	4							
NATPROG	5							
CMD	6							
FILE	7							
CQDURA	8	Y						
ADADURA	9							
IOS	10							

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

Worst Calls by DESC UPD Report

The Worst Calls by DESC UPD report is an example of a Worst Calls report.

```
12:12:17                  WORST CALLS BY-> DESC UPD                  2010-06-24
                 12:12:16 2010-06-24 Thru 12:12:16 2010-06-24        LOCL=00204
                                                                     Page:    1

 Sequence    CQ-Job  TPUserid NAT-Appl NAT-Pgm  Cmd  File    Desc-Upd
----------- -------- -------- -------- -------- --- ------ -------------

        585 XXX      XXX      SYSREVDB SR-00015 V4       0             0
        584 XXX      XXX      SYSREVDB P-DBVWRT RC       0             0
        583 XXX      XXX      SYSREVDB P-DBVWRT RC       0             0
        582 XXX      XXX      SYSREVDB P-DBVWRT L3       8             0
        581 XXX      XXX      SYSREVDB P-DBVWRT S1       8             0
        580 XXX      XXX      SYSREVDB USR1029N RC       0             0
        579 XXX      XXX      SYSREVDB USR1029N L3       8             0
        578 XXX      XXX      SYSREVDB USR1029N S1       8             0
        577 XXX      XXX      SYSREVDB NAT00060 RC       0             0
*********** ******** ******** ******** ******** *** ****** *************

*****   E N D    O F    R E P O R T   *****


Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
12:12:17                  WORST CALLS BY-> DESC UPD                  2010-06-24
                 12:12:16 2010-06-24 Thru 12:12:16 2010-06-24        LOCL=00204

                                                 Total        Total
 Sequence       ADA-Dur       Num-of-IOs      Desc-Upd      Commands
----------- ---------------- ------------- ------------- ------------

        585         0.000000             0             0            1
        584         0.000117             0             0            1
        583         0.000100             0             0            1
        582         0.000481             0             0            1
        581         0.007516             0             0            1
        580         0.000493             0             0            1
        579         0.003002             0             0            1
        578         0.000925             0             0            1
        577         0.000040             0             0            1
            ***************** *************             0            9




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
CQJOB	2							
TPUSERID	3							
NATAPPL	4							
NATPROG	5							
CMD	6							
FILE	7							
DESUPD	8	Y						
ADADURA	9							
IOS	10							
COMMANDS		Y						

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

Worst Calls by IOs Report

The Worst Calls by IOs report is an example of a Worst Calls report.

```
 12:20:02                    WORST CALLS BY-> IOS                     2010-06-24
                 12:19:53 2010-06-24 Thru 12:20:01 2010-06-24        LOCL=00204
                                                                     Page:    1

 Sequence    CQ-Job  TPUserid NAT-Appl NAT-Pgm  Cmd  File   Num-of-IOs
 ----------- -------- -------- -------- -------- --- ------ -------------

        767 XXX      XXX      SYSREVDB SR-00017 V4       0             0
        766 XXX      XXX      SYSREVDB P-DBVWRT RC       0             0
        765 XXX      XXX      SYSREVDB P-DBVWRT RC       0             0
        764 XXX      XXX      SYSREVDB P-DBVWRT L3       8             7
        763 XXX      XXX      SYSREVDB P-DBVWRT S1       8             0
        762 XXX      XXX      SYSREVDB USR1029N RC       0             0
        761 XXX      XXX      SYSREVDB USR1029N L3       8             0
        760 XXX      XXX      SYSREVDB USR1029N S1       8             0
 ********** ******** ******** ******** ******** *** ****** *************

 *****   E N D    O F    R E P O R T   *****



 Command: ____________________________________________________________________
 Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
       Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
12:20:02                    WORST CALLS BY-> IOS                     2010-06-24
                 12:19:53 2010-06-24 Thru 12:20:01 2010-06-24        LOCL=00204

                                                 Total        Total
 Sequence       ADA-Dur          Cmd-Resp     Num-of-IOs     Commands
----------- ---------------- -------------- ------------- ------------

       767         0.000000       0.000000             0            1
       766         0.000096       0.007250             0            1
       765         0.000211       0.012875             0            1
       764         0.026738       1.184625             7            1
       763         0.000160       0.095125             0            1
       762         0.000620       0.004750             0            1
       761         0.000252       0.175750             0            1
       760         0.000708       0.087625             0            1
           ***************** **************             7            8




Command: ____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu    ↩
```

This section covers the following topics:

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
CQJOB	2							
TPUSERID	3							
NATAPPL	4							
NATPROG	5							
CMD	6							
FILE	7							
IOS	8	Y						
ADADURA	9							
CMDRESP	10							
COMMANDS		Y						

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

Worst Calls by ISN QUAN Report

The Worst Calls by ISN QUAN report is an example of a Worst Calls report.

```
12:25:36                  WORST CALLS BY-> ISN QUAN                  2010-06-24
                 12:25:27 2010-06-24 Thru 12:25:35 2010-06-24        LOCL=00204
                                                                     Page:    1

 Sequence    CQ-Job  TPUserid NAT-Appl NAT-Pgm  Cmd  File     ISN-Qty
---------- -------- -------- -------- -------- --- ------ -------------

        934 XXX      XXX      SYSREVDB P-DBVWRT L3       8             0
        933 XXX      XXX      SYSREVDB P-DBVWRT S1       8             1
        932 XXX      XXX      SYSREVDB USR1029N RC       0             0
        931 XXX      XXX      SYSREVDB USR1029N L3       8             0
        930 XXX      XXX      SYSREVDB USR1029N S1       8             1
********** ******** ******** ******** ******** *** ****** *************

*****   E N D    O F    R E P O R T   *****




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +                ===>  Menu
```

```
12:25:36                  WORST CALLS BY-> ISN QUAN                  2010-06-24
                 12:25:27 2010-06-24 Thru 12:25:35 2010-06-24        LOCL=00204

                                                 Total        Total
 Sequence       ADA-Dur       Num-of-IOs       ISN-Qty      Commands
---------- ---------------- ------------ ------------- ------------

        934         0.015030            7             0            1
        933         0.000056            0             1            1
        932         0.000026            0             0            1
        931         0.000107            0             0            1
        930         0.000096            0             1            1
            **************** ************             2            5









Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
CQJOB	2							
TPUSERID	3							
NATAPPL	4							
NATPROG	5							
CMD	6							
FILE	7							
ISNQ	8	Y						
ADADURA	9							
IOS	10							
COMMANDS		Y						

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

Worst Calls by TOTDURA Report

The Worst Calls by TOTDURA report is an example of a Worst Calls report.

```
12:41:07                  WORST CALLS BY-> TOTDURA                    2010-06-24
                 12:41:07 2010-06-24 Thru 12:41:07 2010-06-24         LOCL=00204
                                                                      Page:    1

 Sequence   TPUserid NAT-Pgm  Cmd    Total-Dur         ADA-Dur
---------- -------- -------- --- ---------------- ----------------

       1110 XXX      SR-00019 V4          0.000000         0.000000
       1109 XXX      SR-00019 S1          0.000344         0.000184
       1108 XXX      SR-00019 S1          0.001312         0.000720
       1107 XXX      P-DBVWRT RC          0.000035         0.000019
       1106 XXX      P-DBVWRT RC          0.000075         0.000043
********** ******** ******** *** ***************** *****************

*****   E N D    O F    R E P O R T   *****




Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +                ===>  Menu
```

```
12:41:07                  WORST CALLS BY-> TOTDURA                    2010-06-24
                 12:41:07 2010-06-24 Thru 12:41:07 2010-06-24         LOCL=00204

                                                          Total
 Sequence        CQ Dur       File   CQ-Job  NAT-Appl    Total-Dur
---------- ---------------- ------ -------- -------- ----------------

       1110         0.000000      0 XXX      SYSREVDB         0.000000
       1109         0.000160      8 XXX      SYSREVDB         0.000344
       1108         0.000592      8 XXX      SYSREVDB         0.001312
       1107         0.000016      0 XXX      SYSREVDB         0.000035
       1106         0.000032      0 XXX      SYSREVDB         0.000075
            ***************** ****** ******** ********         0.001766









Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===  ===>  Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
SEQUENCE	1							
TPUSERID	2							
NATPROG	3							
CMD	4							
TOTDURA	5	Y						
ADADURA	6							
CQDURA	7							
FILE	8							
CQJOB	9							
NATAPPL	10							
COMMANDS		Y						

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

Worst Transactions... Reports

The three Worst Transactions reports list and calculate information about the 100 worst transactions. Each report rates its transactions according to certain criteria:

Worst Transactions by ...	Selects the 100 transactions that ...
Calls	issued the most Adabas calls.
Duration	required the most Adabas processing time, including time spent in the command queue.
IOS	caused the most I/O operations to be performed.

The number of transactions shown can be varied from 100, by changing the "ENTRIES=" option to any number desired. For example, "ENTRIES=50" displays the 50 worst transactions.

- Worst Transactions by Calls Report
- Worst Transactions by Duration Report
- Worst Transactions by IOs Report

Worst Transactions by Calls Report

The report Worst Transactions by Calls report is an example of a Worst Transactions report.

```
12:47:50                  WORST TRANSACTIONS BY CALLS                  2010-06-24
                 12:45:38 2010-06-24 Thru 12:47:49 2010-06-24          LOCL=00204
                                                                       Page:    1
                                    Total         Total           Total
 Trans Nr   TPUserid NAT-Appl  Num-of-IOs     Commands      Total-Dur
----------- -------- -------- ------------- ------------ ----------------

          0 XXX      SYSREVDB              9           56          0.053288
********** ******** ********              9           56          0.053288

*****   E N D    O F    R E P O R T   *****









Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +                ===>  Menu
```

```
12:47:50                  WORST TRANSACTIONS BY CALLS                  2010-06-24
                 12:45:38 2010-06-24 Thru 12:47:49 2010-06-24         LOCL=00204

                  Total             Total
 Trans Nr        ADA-Dur           CQ Dur
----------- ---------------- ----------------

          0         0.036936         0.016352
                    0.036936         0.016352

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
TPTRANNM	1							
TPUSERID	2							
NATAPPL	3							
IOS		Y						
COMMANDS		Y						
TOTDURA		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

```
DISPLAY BY = USAGE
ENTRIES = 100
```

Report Processing Rules

None.

Worst Transactions by Duration Report

The report Worst Transactions by Duration report is an example of a Worst Transactions report.

```
12:52:32               WORST TRANSACTIONS BY DURATION               2010-06-24
                12:52:20 2010-06-24 Thru 12:52:31 2010-06-24        LOCL=00204
                                                                    Page:    1
                                    Total          Total         Total
 Trans Nr   TPUserid NAT-Appl    Total-Dur       Commands    Num-of-IOs
----------- -------- -------- ---------------- ------------ -------------

          0 XXX      SYSREVDB         0.075285           50             9
********** ******** ********         0.075285           50             9

*****   E N D    O F    R E P O R T   *****









Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
12:52:32                WORST TRANSACTIONS BY DURATION                2010-06-24
                  12:52:20 2010-06-24 Thru 12:52:31 2010-06-24        LOCL=00204

                   Total            Total
 Trans Nr        ADA-Dur          CQ Dur
----------- ---------------- ----------------

          0         0.071541         0.003744
                    0.071541         0.003744

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
TPTRANNM	1							
TPUSERID	2							
NATAPPL	3							
TOTDURA		Y						
COMMANDS		Y						
IOS		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

Worst Transactions by IOs Report

The report Worst Transactions by IOs report is an example of a Worst Transactions report.

```
12:56:58                   WORST TRANSACTIONS BY IOS                   2010-06-24
                 12:56:48 2010-06-24 Thru 12:56:58 2010-06-24          LOCL=00204
                                                                       Page:    1
                                  Total         Total           Total
 Trans Nr   TPUserid NAT-Appl  Num-of-IOs     Commands      Total-Dur
----------- -------- -------- ------------ ------------ ----------------

          0 XXX      SYSREVDB             9           71         0.054694
********** ******** ********             9           71         0.054694

*****   E N D    O F    R E P O R T   *****









Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +               ===>  Menu
```

```
12:56:58                  WORST TRANSACTIONS BY IOS                  2010-06-24
                 12:56:48 2010-06-24 Thru 12:56:58 2010-06-24        LOCL=00204

                  Total            Total
 Trans Nr        ADA-Dur          CQ Dur
----------- ---------------- ----------------

          0         0.042710         0.011984
                    0.042710         0.011984

Command: _____________________________________________________________________
Enter-PF1---PF2---PF3---PF4---PF5---PF6---PF7---PF8---PF9---PF10--PF11--PF12---
      Help  Sort  Exit              --    Rdsp   +          <===        Menu
```

This section covers the following topics:

- Fields Selected
- Report Options Selected
- Report Processing Rules

Fields Selected

Field System Name	Order	Sum	Min	Max	Avg	Pct	Rate	Round
TPTRANNM	1							
TPUSERID	2							
NATAPPL	3							
IOS		Y						
COMMANDS		Y						
TOTDURA		Y						
ADADURA		Y						
CQDURA		Y						

Report Options Selected

```
DISPLAY BY = SUMFIELD
ENTRIES = 100
```

Report Processing Rules

None.

4 Summary Record Layout

This chapter describes the format of the summary records copied to a sequential output file.

Note: Software AG does not provide a program that reads this file. However, DSECT samples are supplied in members SUMRECD, SUMRECH and SUMRECS of the source library for users who wish to write their own programs to read this data.

The Header Portion

A fixed-length header is created for each record written to the sequential file. The format of the header is described in the following table:

Offset		Length Bytes	Format	Explanation
Hex	Decimal			
0	0	2	Binary	Record Length
2	2	2	Binary	X'0000'
4	4	3	Alphanumeric	Eye catcher "SUM"
7	7	1	Alphanumeric	Record type "H" for header
8	8	32	Alphanumeric	Report name
28	40	8	Binary	STCK value when record gets written
30	48	1	Binary	Flag of trigger event: X'01' -- report is closed or suspended X'02' -- time interval reached X'04' -- trigger command executed X'08' -- report is closed and restarted
31	49	1	Binary	Unused
32	50	10	Alphanumeric	Date of first record (YYYY-MM-DD)
3C	60	8	Alphanumeric	Time of first record (HH:MM:SS)
44	68	10	Alphanumeric	Date of last record (YYYY-MM-DD)
4E	78	8	Alphanumeric	Time of last record (HH:MM:SS)
56	86	2	Binary	Database ID
58	88	2	Binary	Offset to data record
5A	90	6	Binary	Unused

The Schema Portion

This portion of the summary record varies, depending upon the fields used in the report. The schema describes the layout of the field data which follows afterwards. The format of the schema portion of the summary record is shown in the following table:

Offset		Length Bytes	Format	Explanation
Hex	Decimal			
60	96	2	Binary	Record Length
62	98	2	Binary	X'0000'
64	100	3	Alphanumeric	Eye catcher "SUM"
67	103	1	Alphanumeric	Record type "S" for schema
68	106	6	Binary	Unused
6E	104	2	Binary	Total number of fields
Varies +00	Varies +0	8	Alphanumeric	Field name (see the ***Field Reference***,elsewhere in this guide)[1]
+08	+8	2	Binary	Data length
+0A	+10	1	Alphanumeric	Data format: C'B' -- binary X'C' -- character
+0B	+11	1	Alphanumeric	Field type: C'A' -- Account field C'C' -- COST field* C'M' -- MIN (minimum) field C'P' -- PCT (percent) field C'R' -- RATE field C'S' -- SUM (summary) field C'T' --TOT (total cost) field* C'V' -- AVG (average) field C'X' -- MAX (maximum) field * - The COST and TOT fields can only be defined in autostarted or batch reports.

[1] The following fields use alternate names than the one listed in the field reference list.

Field Name in the *Field Reference*	Field Name in the Summary Record
ADDIT*x*	ADD*x*
FILE	FNR
IOS	IO
NATAPPL	LOG
NATPROG	PRO
NUCID	SMP

Determining the Format of the Variable Portion

To determine the format of the variable portion of the record:

- Refer to the report definition for each field (including virtual fields such as summary fields). Twelve bytes in total are reserved for the field name, the data length, the format of the field, and the field type.

The Data Portion

This portion of the summary record varies, depending upon the fields used in the report. The data portion contains the contents of the fields that are described in the **schema portion**. The format of the data portion of the summary record is shown in the following table:

Offset		Length Bytes	Format	Explanation
Hex	Decimal			
Varies +0	Varies +0	2	Binary	Record Length
+2	+2	2	Binary	X'0000'
+4	+4	3	Alphanumeric	Eye catcher "SUM"
+7	+7	1	Alphanumeric	Record type "D" for data
+8	+8	Varies	Binary/alphanumeric	Data portion for all fields, as defined in the **schema portion**.

Determining the Format of the Variable Portion

To determine the format of the variable portion of the record:

- Refer to the **schema portion** of this record. For each report field, the data length and format are stored.

Calculating the Number of Summary Records That Can Be Stored

To determine the number of summary records that can be stored on the summary log file, the size of the summary record and the specified block size must be taken into consideration.

The record size of a summary log record can be calculated using the summary record layout described elsewhere in this section. In the following examples, the size of the summary log record is 182 bytes. So the bytes user for one summary record is 186 bytes: `182 + 4` (record length).

Example 1: 3390 Device with Block Size of 10.000

- Available bytes per block: `9.996 = 10.000 - 4` = (4-byte block length)
- Records per block: `53 = 9.996/186 = Trunc(53,74)`
- Blocks per track: `5 = 57000/10.000 = Trunc(5,7)`
- Tracks per cylinder: `15`
- Records per cylinder: `3975 = 53 * 5 * 15`

Example 2: 3390 Device with Block Size of 27.998

- Available bytes per block: `27.994 = 27.998 - 4` = (4-byte block length)
- Records per block: `150 = 27.994/186 = Trunc(150,5)`
- Blocks per track: `2 = 57000/27.994 = Trunc(2,03)`
- Tracks per cylinder: `15`
- Records per cylinder: `4500 = 150 * 2 * 15`

Comparing these two examples, we see that you can store 525 more records per cylinder when using a larger block size `(4500 - 3975 = 525)`.

5 User Exit Reference

This chapter describes the user exits provided with Adabas Review.

P-UEXIT1, P-UEXIT2 and P-UEXIT3: Review Natural User Exits

Adabas Review has three Natural user exits. These exits are located in the Adabas Review system library in Natural, and may be modified using the Natural editor.

- P-UEXIT1 is invoked when the online portion of Adabas Review (SYSREVDB) is entered. A possible use for this user exit might be the setting of customer-specific colors or switching the PC mode on or off.

  Important: The P-UEXIT1 user exit that is called when SYSREVDB is entered must not alter the Natural stack; it must end with a `STOP` command.

- P-UEXIT2 is invoked when PF12 is clicked on the Main Menu or when a termination command (such as `FIN`, `QUIT`, or `LOGON`) is entered on the command line of the Main Menu of SYSREVDB. When PF12 is clicked or a termination command is entered, the Natural system variable *COM contains the string "PF12 FROM MAIN MENU". When delivered, P-UEXIT2 performs no function at all. A possible use case for this user exit is the automatic logon to another Natural application.
- P-UEXIT3 is invoked when PF3 is clicked on the Main Menu or when the `EXIT` command is entered on the command line of the Main Menu of SYSREVDB. When PF3 is clicked or the `EXIT` command is entered, the Natural system variable *COM contains the string "PF3 FROM MAIN MENU".

  The normal Adabas Review behavior for PF3 or the `EXIT` command from the Main Menu is to leave SYSREVDB and log the user into a private Natural environment set up for that user. You can use P-UEXIT3 to alter this behavior, possibly when your users have no private Natural environments established. When delivered, P-UEXIT3 performs no function at all.

  Note: If your P-UEXIT3 code returns the user to SYSREVDB after the exit completes, the normal Adabas Review PF3 behavior will be invoked. If this is not what you want to happen, make sure that the exit does not return to SYSREVDB implicitly or with the ESCAPE MODULE.

REVUEX1: User Field User Exit

REVUEX1 is called from the ADALNK REVEXIT. Using this user exit you can provide user-specific data to be passed to Adabas Review. To do this, move the desired data into a 32-byte area in the RUBX. An address to this area is provided in the parameters passed to the REVUEX1 exit. The RUBX area is the area where link-relevant information is passed to Adabas Review. Once the user exit is processed, this user-specific data can be viewed in Adabas Review reports using a user field that accesses the Adabas Review field RDBLKUSR.

Note: It is possible to use any user field, but the RDBLKUSR user field name cannot be changed; it is reserved for use with REVUEX1. In addition, you might find it necessary to modify the Adabas Review DDM if you want to view this field on line. For more information, read *Defining Adabas Review User Fields*, in the *Adabas Review Administration Guide*.

Important: If an ADALNK batch link routine has been modified to accommodate the needs of an Adabas product extension (such as Adabas Review), it should not be used for the Adabas nucleus or Adabas utility jobs.

Installation Steps

The following installation steps must be completed to activate the user field user exit:

1 Customize REVUEX1 as needed. Sample source for the exit can be found in the Adabas Review source (SRCE) library. For information about parameters passed to the exit, read ***Parameters Passed to the Exit***, elsewhere in this section.

Note: The name REVUEX1 cannot be changed.

2 Assemble REVUEX1. A sample assembly job for the user exit, AREVUEX1, is provided in the Adabas Review jobs (JOBS) library.

3 Link REVUEX1 with the Adabas Review ADALNK REVEXIT. A sample job, LREVUEX1, is provided in the Adabas Review jobs (JOBS) library.

4 Link the Review ADALNK REVEXIT with the Adabas link routines. Sample jobs with names in the form LREVL*xxx* can be found in the Adabas Review jobs (JOBS) library.

Input Parameters Passed to the Exit

Input parameters for the exit are expected in the following registers:

Register	Parameter
1	Address of the user parameter list (for example, ACB,RB,FB).
2	Address of the user field data that can be modified. Thirty-two (32) bytes are reserved for the user field data.

Other Register Values at Entry to the Exit

Register	Description
13	Save area of calling ADALNK routine
14	Return address to ADALNK routine
15	Entry point address for the user exit

Viewing the User-Specific Data in a Report

To view the user-specific data in a report, specify a user field with following definition:

```
NAME=USERFLD1
LEN=32
INTYPE=C
OUTTYPE=C
FIELD=RDBLKUSR
DISPLEN=32
HEADER=RDBLKUSR     ↩
```

The RDBLKUSR user field name cannot be changed; it is reserved for use with REVUEX1 (user field exit).

REVUEX5: Adabas Review Hub Event Handler (Adabas Exit 5)

User exit 5 is called by the Adabas nucleus when an *event* occurs with the Adabas Review hub. User exit 5 must be specified in ADARUN parameter UEX5 in the Adabas nucleus startup job. An event is defined as:

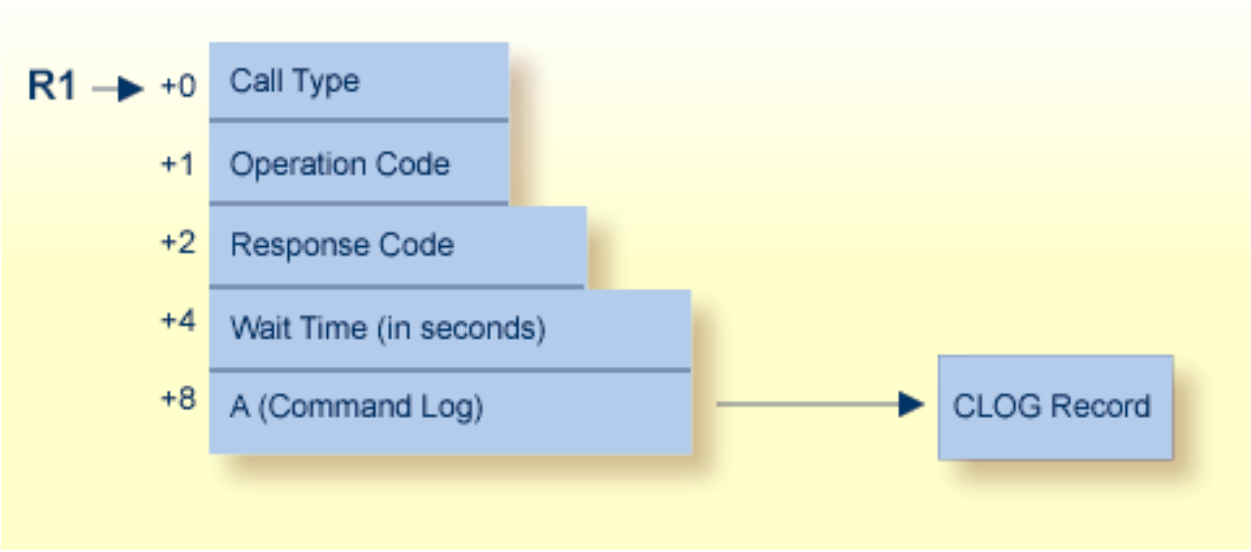
- a connection made with the Adabas Review hub during Adabas session open;
- a connection ended with the Adabas Review hub during Adabas session close; or
- a non-zero return code received from the send operation for a command log record. When buffering is active, this return code is provided once for a whole buffer and it is possible that only parts of the buffer were not transferred correctly.

The exit is invoked with AMODE=31 and should return control in the same state.

The exit is required to process logging errors. It determines how the failure is handled. The parts of the buffer that were not logged and the response code received from the Adabas Review hub logging request are provided to assist in making the determination.

Input Parameters

On entry, register 1 points to the following parameter list:



Parameter	Usage
0(R1)	Exit call indication. The value of this byte can be: ■ "O" -- connection with Adabas Review hub opened; ■ "C" -- connection with Adabas Review hub closed; or ■ "L" -- sending logging error to Adabas Review hub.
1(R1)	Action to handle a logging error (ignored for open and close). The exit must provide one of the following values for this field in the parameter list for a logging error: ■ "W" -- wait for a specified time and then retry; ■ "R" -- retry logging operation immediately; or ■ "I" -- ignore the logging failure and continue without consequence.

Parameter	Usage
2(R1)	Response code for logging errors. This response code is the same as the Adabas response code in the *Adabas Messages and Codes* documentation.
4(R1)	Fullword where the exit must provide a wait time (in seconds) for the logging failures that are to be retried after waiting.
8(R1)	Address of the command log record that the Adabas nucleus was attempting to send to the Adabas Review hub.

Other Register Values at Entry

Value	Description
R13	Save area of calling Adabas nucleus routine.
R14	Return address in Adabas nucleus.
R15	Entry point address for exit.

Output Parameters

- For logging errors, the exit is required to set a value in the *operation* field. If the wait value (W) is chosen, the exit is also required to provide a non-zero time value.
- Register 15 should be set to zero. All other registers should be returned intact.

REVUXDET: Report Exit for Detailed Reports

Adabas Review provides a detailed report user exit that is called when a command log record is selected for the report. Only records that pass the processing rules are provided to the user exit.

This exit may be used to create SMF records, accounting records, or for any other purpose.

Installation Steps

To install the user exit:

1 Specify the name of the user exit when creating the report.

For an online report, enter the exit name in the `Exit Name` field in the **Detail Exit** area of the Report Options screen.

When defining batch parameters, specify TYPE=DETAIL and the REPORT-EXIT= keyword of the REPORT statement. Read *REPORT Statement* in *Using Batch Facilities*in the *Adabas Review User's Guide* for more information.

2 Provide the detailed report user exit in an executable library accessible to Adabas Review.

Input Parameters Passed to the Exit

The detailed report user exit receives control using standard linkage:

R1	Address of the parameter list
R13	18 fullword savearea address
R14	Return address
R15	Entry-point address of the user exit

The parameter list contains two entries:

0(R1)	Reserved for future use
4(R1)	Address of the command log record

REVUXLOG: Command or Summary Logging User Exit

Adabas Review writes to command and summary log files in sequential order. When a log file is filled, Adabas Review closes the file, switches to the next sequential file, and continues logging. The following messages are issued: REV20151 and REV20152. No check is actually performed to determine whether the log data set is empty, and REV20152 is displayed in all cases.

When all files have been filled, Adabas Review switches back to the oldest file to log data. Adabas Review will write over the log data in the file containing the oldest data. Therefore, it is the responsibility of the customer to copy the data before this overwrite can occur.

A command or summary logging user exit can be specified so that the data contained in the command or summary log files can be copied to a new file before the log file is overwritten with new log data. This user exit will be called each time a command or summary log file is closed, but it is only called if you reference it in the User Exit (command logs) or Log Full Exit (summary logs) report logging option. For more information about these logging options, read *Logging Options*, in the *Adabas Review User's Guide*.

- Installation Steps

Installation Steps

The source library member REVUXLOG contains sample code for the user exit that processes command or summary logs. You may modify this exit so that it conforms to your site requirements, and you can include the exit name in the User Exit (command logs) or Log Full Exit (summary logs) logging option on the **Report Options** screen of your report definition.

REVCLCOP Sample Copy Job

When a command or summary log file is closed, the user exit starts the command or summary log copy job. The z/OS JCL or z/VSE JCS library member REVCLCOP or REVCLCOP.X contain a sample log copy job. This job copies the contents of a filled command or summary log file to another device and appends the new data to existing data. This job also reinitializes the end-of-file marker in the command or summary log file.

REVUXSUM: Report Exit for Summary Reports

Adabas Review provides a summary report user exit that is called whenever:

- A specified Adabas command is selected for the report
- A report is summarized.

A report is summarized when it is:

- Closed or purged from the LS screen;
- Closed by an interval event;
- Deactivated because the MAXSTORE limit was exceeded; or
- Running when Adabas Review is terminated.

You may control the conditions that trigger the exit.

A report calling a summary exit is limited to one account (`Order`) field. If a summary report exit is specified and the report has multiple account fields, syntax error message REV00408 is issued.

- Return Codes

Installation Steps

To install the user exit:

1 Specify the name of the user exit when creating the report.

For an online report, enter the exit name in the `Exit Name` field in the **Summary Exit** area of the Report Options screen.

To control the conditions that drive the exit, the Report Options screen allows you to enter an Adabas command (`Cmd` field) and specify whether to call the exit at summarization time (`Sum` field). If the Adabas command field is left blank, the exit is only called when the report is summarized. If `SUM` is set to "N" and the Adabas command field is blank, the exit is never called.

When defining batch parameters, specify TYPE=SUMMARY and the SUMMARY-EXIT= keyword of the REPORT statement. Read about the *REPORT Statement* in *Using Batch Facilities*in the *Adabas Review User's Guide* for more information.

2 Provide the summary report user exit in an executable library accessible to Adabas Review.

Input Parameters Passed to the Exit

The summary report user exit receives control using standard linkage:

R1	Address of the parameter list
R13	18 fullword savearea address
R14	Return address
R15	Entry-point address of the user exit / Return code upon return

The parameter list contains the following entries:

Offset	Address of . . .	
0(R1)	the reason for being called. This is a one-byte binary bit map.	
	X'80'	The exit was called because the specified command was selected.
	X'40'	The exit was called during summary processing.
	X'01'	If this bit is on in addition to one of the above, it indicates that this is the last account entry for the report.
4(R1)	the Adabas command. This is a two-byte character field. If the exit was called with X'80', the field indicates the Adabas command that is used as a trigger.	
8(R1)	the report name. This is a 32-byte character field.	

Offset	Address of . . .
12(R1)	the summary record.
20(R1)	the command log record.

Summary Exit Record

The summary record is a variable length record that contains the field names and values for the report. It has a fixed portion and a variable portion.

Note: The layout of the summary exit record is different from the layout of the summary record written to the summary log file.

Here is the summary exit record layout:

```
************************************************************
*   FIXED PORTION OF SUMMARY RECORD                        *
************************************************************
RECLEN   DS   H              TOTAL RECORD LENGTH (INCLUSIVE)
         DS   H              UNUSED
SUMCOUNT DS   H              NUMBER OF SUMMARY ENTRIES
SOFFSET  DS   H              OFFSET OF SUMMARY PORTION
ACCLEN   DS   H              LENGTH OF ACCOUNT DATA
ACCTNAME DS   CL8            NAME OF ACCOUNT FIELD
*
************************************************************
*   VARIABLE PORTION OF SUMMARY RECORD                     *
************************************************************
ACCTDATA DS   OCL1           START OF ACCOUNT DATA
ACCTPAD  DS   OCL1           PADS OUT TO DOUBLEWORD
SUMFLD   DS   OCL8           NAME OF SUMMARY FIELD
SUMVAL   DS   OXL8           VALUE OF SUMMARY FIELD
```

The exit is called for each account entry (`Order` Field) in the report.

The last two fields above repeat for each summary field in the report.

All fields names are 8-byte character fields.

All summary data values are 8-byte binary fields.

The `ACCTDATA` field above always starts at the same offset, but its length is variable.

Return Codes

Upon returning from the exit, the user is responsible for setting a return code in R15:

R15 = 0	A zero return code indicates a normal return.
R15 # 0	A nonzero return codes indicates that the user requested the system to zero all summary data for this account entry.

6 ADARUN Parameters for Adabas Review

ADARUN performs the following functions:

- Loads the ADAIOR module, which performs all database I/O and other operating-system-dependent functions.
- Interprets the ADARUN parameter statements; then loads and modifies the appropriate Adabas nucleus or utility modules according to the ADARUN parameter settings.
- Transfers control to Adabas.

The ADARUN statement, normally a series of entries specifying one or more ADARUN parameter settings, is specified in the DDCARD data set in z/OS and BS2000 environments and in the CARD data set in z/VSE environments. For more specific job information, refer to the appropriate installation manual.

The ADARUN control statement defines and starts the Adabas operating environment. The ADARUN control statement also starts Adabas utilities. The ADARUN parameters described in this chapter apply specifically to the Adabas nucleus and the Adabas Review hub. Not every parameter described here applies to every operating environment (z/OS, z/VSE, or BS2000).

Unless noted otherwise, each parameter has a default value that ADARUN uses if the parameter is not specified.

ADARUN Parameter Syntax

The syntax for the ADARUN statement and parameters is:

```
ADARUN parameter=value,...
```

In this syntax, *parameter=value* is one or more of the ADARUN parameters described in this section.

Any number of blanks is permitted between "ADARUN" and the first parameter, but no blanks are permitted within the *parameter=value* string. Commas (,) must be used as separators. A blank following a *parameter=value* entry indicates the end of the statement.

The literal "ADARUN" must be entered in positions 1-6 of each ADARUN statement. All *parameter=value* entries must end before position 73. Any *parameter=value* entries that would extend beyond position 72 must be coded on a new statement as shown below. The comma following the last *parameter=value* entry of a statement is optional, and is not interpreted as a continuation character. Positions 73-80 are ignored. An asterisk (*) in position 1 indicates a user comment line.

The following table summarizes the ADARUN statement format. The first statement cannot continue beyond position 72. The second statement represents a continuation of the first statement. All ADARUN continuation statements have the same format and restrictions as the first statement.

Positions 1-6	Positions 8-72
ADARUN	*parameter=value.parameter=value,...*
ADARUN	*parameter=value*

CMDQMODE Parameter: Command Queue Mode

This parameter applies to the BS2000 operating system only.

Parameter	Specify . . .	Possible Values	Default
CMDQMODE	whether to allocate the command queue memory pool below or above the 16-MB line.	BELOW | ABOVE	ABOVE (BELOW for Adabas versions prior to Version 8)

CMDQMODE specifies whether to allocate the BS2000 memory pool for the Adabas command queue below or above the 16-MB line.

Value	Meaning
BELOW	The default setting. Places the BS2000 memory pool for the Adabas command queue below the 16-MB line in one or more 64-kilobyte segments.
ABOVE	Places the BS2000 memory pool for the Adabas command queue above the 16-MB line in one or more 1-MB segments.

Example

The following example, places the Adabas command queue memory pool above the 16-MB line in 1-MB segments.

```
ADARUN PROG=ADANUC,CMDQMODE=ABOVE
```

CT Parameter: Command Timeout Limit

Parameter	Specify . . .	Minimum	Maximum	Default
CT	the maximum time (seconds) for interregion communication of results from Adabas to the user.	1	16777215	60

For Adabas Review, this is the maximum number of seconds (more precisely, units of 1.048576 seconds) that can elapse from the time an Adabas Review hub command has been completed until the results are returned to the user through the interregion communication (operating-system-dependent).

This parameter is used to prevent a command queue element and attached buffer from being held for a long period of time for a user who has terminated abnormally.

Possible causes of a command timeout are

- user region is swapped out or cannot be dispatched;
- user is canceled;
- user has low priority in high activity system.

If the CT limit is exceeded,

- the command queue element and attached buffer are released;
- a message ADAM93 is printed; and
- if the user has not terminated, response code 254 (ADARSP254) is returned to the user program.

Example

The following example permits about 30 seconds to obtain a result through interregion communication from the Adabas Review hub

```
ADARUN PROG=ADAREV,CT=30
```

FORCE Parameter: Allow Nucleus Database ID or Review Hub Table Entry Overwrite

Parameter	Specify . . .	Possible Values	Default
FORCE	whether the nucleus or Adabas Review hub can overwrite an existing ID table entry.	YES | NO	NO

If running Adabas Review, this indicates whether the Adabas Review hub can overwrite an existing ID table entry. When a Review hub starts up, ADARUN scans the ID table to ensure that no entry exists for the Review hub. You can use the FORCE parameter to indicate whether the Review hub can overwrite an existing ID table entry.

The ID table entry is derived from the database ID and the job name. For Adabas Review, the ID table entry is derived from the Review hub ID (REVIEW=). The ID table entry is deleted when the nucleus terminates normally.

The FORCE parameter allows the nucleus or Adabas Review hub to overwrite the existing ID table entry and access the database.

Caution: Do not use the FORCE parameter unless absolutely necessary, or the integrity of the database could be lost. Ensure that no nucleus or Review hub is active for the ID table entry being overwritten.

Value	Meaning
YES	The nucleus or Adabas Review hub that is starting can overwrite an existing ID table entry. FORCE=YES is required when restarting a session that terminated abnormally with an ADAM98 message. In this case, the ID table still contains an active entry for the nucleus or Review hub. Overwriting the existing entry by specifying FORCE=YES prevents further communication to the overwritten nucleus or hub and causes loss of cross-memory environment resources, which cannot be restored until the next IPL.
NO	(default) If the ID table contains an entry for the nucleus or Adabas Review hub that is starting, the nucleus is denied access to the database or the Review hub is not permitted to start.

Note: In an Adabas Cluster Services or Adabas Parallel Services environment, the FORCE parameter applies to the NUCID, rather than the database ID, because a cluster nucleus builds an ID table entry for the NUCID.

A data integrity block (DIB) entry will only be removed once the ID Table initialization has been successful. Therefore, you must set IGNDIB and FORCE both to "YES" if either of the following occur:

- You receive a PARM ERROR 26 after parameter settings IGNDIB=NO and FORCE=YES were applied;
- You receive a PARM ERROR 23 after parameter settings IGNDIB=YES and FORCE=NO were applied.

Examples

The following example specifies that if the ID table contains an active entry for DBID 7, overwrite the entry.

```
ADARUN PROG=ADANUC,FORCE=YES,DBID=7
```

The following example specifies that if the ID table contains an active entry for the Adabas Review hub, overwrite the entry.

```
ADARUN PROG=ADAREV,FORCE=YES,REVIEW=202
```

LOCAL Parameter: Local Nucleus or Adabas Review Hub

Parameter	Specify . . .	Possible Values	Default
LOCAL	whether an Adabas nucleus or Adabas Review hub is isolated and available for local use only. At this time, the only valid value for an Adabas Review hub is "YES".	YES | NO	YES

Defines an isolated Adabas nucleus or Adabas Review hub that is only available locally. The nucleus or hub is unknown to Entire Net-Work. A nucleus or Adabas Review hub specifying LOCAL=YES (the default) can have the same database ID or hub ID as another database nucleus or Review hub on another network node.

Value	Meaning
YES	Isolates this nucleus or Adabas Review hub (that is, makes it unaddressable) from other Entire Net-Work nodes. This is the only value valid at this time for Adabas Review hubs; hubs are not currently supported in an Entire Net-Work environment.
NO	Allows the nucleus or Adabas Review hub to receive calls from other Entire Net-Work nodes. This value is not currently supported for Adabas Review hubs.

Example

In the following example, the Adabas nucleus is isolated and cannot be addressed by other Entire Net-Work nodes.

```
ADARUN PROG=ADANUC,LOCAL=YES
```

NAB Parameter: Number of Attached Buffers

Parameter	Specify . . .	Minimum	Maximum	Default
NAB	the number of attached buffers to be used.	1	varies, depending on the amount of available virtual storage	16

The NAB parameter defines the number of attached buffers to be used during the session. An attached buffer is an internal buffer used for interregion communication. It is required in all environments. Adabas allocates an attached buffer pool with a size equal to the value of NAB multiplied by 4096 bytes.

You may specify as many attached buffers as fit into the available virtual storage.

In environments running in 31-bit addressing mode, the attached buffer pool space is allocated above the 16-MB line.

The NAB parameter syntax is:

```
NAB={ n | 16 }
```

Specific Product Recommendations

- For Event Replicator Server databases, set parameter `NAB` to a value greater than or equal to: `41 * 10 * the-number-of-Adabas-nuclei-sending-data-to-the-Event-Replicator-Server`.

  For example, if one Adabas nucleus will be sending data to the Event Replicator Server, set the `NAB` parameter greater than or equal to 410 (for example NAB=420).
- If data is sent through Entire Net-Work from one or more Adabas nuclei to an Event Replicator Server, the Entire Net-Work NAB parameter must also be set to a value greater than or equal to: `41 * 10 * the-number-of-Adabas-nuclei-sending-data-to-the-Event-Replicator-Server`.
- If the Event Replicator Server is set to support updates by multiple concurrent users to Adabas targets (when the NPADACALLS initialization parameter is set to any value greater than "1"), consider adjusting the value of this parameter in the target Adabas nucleus to ensure the target nucleus can handle updates from multiple concurrent users.
- Your Adabas databases must be running with a NAB setting of 32 or greater if they are to be managed by Adabas Manager in My webMethods Server (MWS) environments.
- Users of the Adabas Review hub should read *Storage Requirements* in the *Adabas Review Concepts ManualStorage Requirements* in the *Adabas Review Concepts Manual* for more information about the space requirements of the Command Queue for Adabas Review.

Example

The following example runs the Adabas Review hub nucleus with 50 attached buffers.

```
ADARUN PROG=ADAREV,NAB=50
```

NC Parameter: Number of Command Queue Elements

Parameter	Specify . . .	Minimum	Maximum	Default
NC	the maximum number of command queue elements.	20	32767	200

The number of command queue elements (CQEs) established for the Adabas or Review hub session determines the maximum number of Adabas commands that may be queued or be in process at any one time during the session.

Each call from the Adabas nucleus is assigned a CQE. The CQE is released when the user receives the results of the command, the Adabas Review hub has processed the command, or the user has been timed out..

192 bytes are required for each CQE.

Software AG recommends that you set NC high enough to allow one command per active user for possible synchronization during execution of the online SAVE database function of the ADASAV utility.

The Adabas session statistics or Adabas Online System can be used to tune this parameter for the next session.

For more information about the space requirements of the Command Queue for Adabas Review, refer to *Storage Requirements* in the *Adabas Review Concepts ManualStorage Requirements* in the *Adabas Review Concepts Manual*.

Specific Product Recommendations

- For Event Replicator Server databases, set parameter `NC` to a value greater than or equal to: `10 * the-number-of-Adabas-nuclei-sending-data-to-the-Event-Replicator-Server`. For example, if one Adabas nucleus will be sending data to the Event Replicator Server, set the `NC` parameter greater than or equal to 10 (for example NC=20).
- If data is sent through Entire Net-Work from one or more Adabas nuclei to an Event Replicator Server, the Entire Net-Work NC parameter must also be set to a value greater than or equal to: `10 * the-number-of-Adabas-nuclei-sending-data-to-the-Event-Replicator-Server`.
- If the Event Replicator Server is set to support updates by multiple concurrent users to Adabas targets (when the NPADACALLS initialization parameter is set to any value greater than "1"), consider adjusting the value of this parameter in the target Adabas nucleus to ensure the target nucleus can handle updates from multiple concurrent users.

Example:

Run the Adabas nucleus with a maximum of 500 elements in the command queue.

```
ADARUN PROG=ADANUC,NC=500
```

The following example runs the Adabas Review hub nucleus with a maximum of 500 elements in the command queue.

```
ADARUN PROG=ADAREV,NC=500
```

PROGRAM Parameter: Program to Run

Parameter	Specify:	Possible Values	Default
PROGRAM	the program to be executed.	see table below	USER

This parameter specifies what to execute. The possible values are described in the following table:

Specify:	To start:
ADACOM	an ADACOM task (used in Adabas Cluster Services and Adabas Parallel Services environments) For more information, refer to your Adabas Cluster Services and Adabas Parallel Services documentation.
ADANUC	an Adabas nucleus For more information about executing an Adabas nucleus, read *Adabas Session Execution*, in the *Adabas Operations Manual*.
ADAREV	an Adabas Review hub. Specify this in conjunction with the ADARUN REVIEW parameter. For more information, refer to your Adabas Review documentation.
NETWRK	an Entire Net-Work node For more information, refer to your Entire Net-Work documentation.
RENTUSER	a user program to be run using a reentrant Adabas batch/TSO link routine. For more information, refer to description of the Adabas TP monitor installation in your Adabas installation documentation.
USER	a user program to be run using a non-reentrant Adabas batch/TSO link routine. For more information, read *Linking Applications to Adabas*, in the *Adabas Operations Manual*
utility-name	an Adabas utility Specify an Adabas utility for *utility-name*. For more information, refer to the *Adabas Utilities Manual*.

Examples

The following example specifies that an Adabas nucleus is running.

```
ADARUN PROGRAM=ADANUC
```

The following example specifies that an Adabas Review hub is running.

```
ADARUN PROGRAM=ADAREV, REVIEW=202
```

The following example specifies that an Entire Net-Work node is running.

```
ADARUN PROGRAM=NETWRK
```

REVFILTER Parameter: Review Record Filtering Control

Parameter	Specify . . .	Possible Values	Default
REVFILTER	whether to allow Adabas Review record filtering during the session.	YES | NO	YES

REVFILTER determines whether command log record filtering may be activated. Filtering can decrease the number of command log records passed to Review for report processing.

Value	Meaning
YES	The default setting. Database command log records may be filtered from report processing, depending upon Review report rules.
NO	All command log records will be passed to Review for report processing.

Examples

In the following example, Adabas Review's record filtering may be activated during the Adabas nucleus session.

```
ADARUN PROG=ADANUC,REVFILTER=YES
```

In the following example, Adabas Review's record filtering will not be in effect for the Adabas nucleus session.

```
ADARUN PROG=ADANUC,REVFILTER=NO
```

REVIEW Parameter: Adabas Review Control

Parameter	Specify . . .	Possible Values	Default
REVIEW	whether to run Adabas Review in local or hub mode specifying the hub ID, or not at all.	NO | LOCAL | dbid	NO

Note: The parameter name REVIEWHUBID is a synonym for REVIEW, provided to ensure downward compatibility with past Adabas releases. We recommend that you use the parameter name REVIEW instead, wherever possible.

REVIEW controls the use of the Adabas Review product:

Value	Meaning
NO	The default setting. Adabas Review is not started. Client report data collection cannot occur if REVIEW=NO is specified.
LOCAL	Adabas Review is started in local mode running as an extension to ADALOG. In local mode, Adabas Review job control statements should be added to the Adabas nucleus startup JCL. **Note:** If an Adabas Review load library is not included in the startup JCL, the REVIEW parameter is automatically changed from LOCAL to NO.
dbid	Adabas Review is started in hub mode. The physical database ID that you specify for the hub identifies ■ the hub (server) itself (with PROGRAM=ADAREV) that is being started; or ■ from an Adabas nucleus (client), the hub that is the target for Adabas Review processing for that nucleus (with PROGRAM=ADANUC). In hub mode, Adabas Review job control statements should be added to the Adabas Review hub startup JCL.

Dynamic Modification

The setting of the ADARUN PROG=ADANUC,REVIEW=dbid parameter can be changed dynamically using the REVIEWHUBID command from the operator console, the ADADBS OPERCOM REVIEWHUBID function, or the Modify Parameter function of Adabas Online System.

Examples

The following example starts hub 202 for the Adabas Review hub (server) installation.

```
ADARUN PROGRAM=ADAREV,REVIEW=202
```

The following example starts the Adabas nucleus that will log to Adabas Review hub 202 for the Adabas Review (client) installation.

```
ADARUN PROGRAM=ADANUC,REVIEW=202
```

REVLOGBMAX Parameter: Logged Buffer Size Limit for Review

Parameter	Use	Values	Default
REVLOGBMAX	Specify the maximum allowable number of bytes of a logged buffer for Review.	Any integer ranging from 0 to 30000	5120

If a buffer is longer than this value, the logged buffer is truncated from the point at which its size exceeds the setting of the REVLOGBMAX parameter. The REVLOGBMAX setting affects the ADARUN LOGGING parameter specifications only for both CLOGLAYOUT=8. The minimum value (368) is the size of the length of the CLOGLAYOUT=8 basic record plus the length of the extended Adabas control block (ACBX).

Example

The following example runs the Adabas nucleus using a logged buffer size limit of 512. Individual logged buffers, such as the format buffer for an Adabas command, will be truncated if they exceed 512 bytes.

```
ADARUN PROG=ADAREV,LOGBMAX=512
```

REVLOGMAX Parameter: Total Logged Buffer Size Limit for a Review Command

Parameter	Use	Values	Default
REVLOGMAX	Specify the maximum size of all of the logged buffers allowed for an Adabas Review command.	Any integer ranging from 2000 to 32768 (32K).	16384

When the sum of sizes of the logged buffers for an Adabas Review command reaches the value of the REVLOGMAX parameter, the buffer exceeding the limit is truncated and all following buffers are omitted. The size of REVLOGMAX must at least be as large as the REVLOGBMAX + 2000 in order to accommodate the largest buffer of the Adabas command. The minimum value (2000) is the size of the length of the CLOGLAYOUT=8 basic record plus the length of the extended Adabas control block (ACBX) and the CLEX information.

The CLOGMAX setting affects the ADARUN LOGGING parameter specifications only for CLOGLAYOUT=8.

Example

The following example runs the Adabas nucleus using a command logged buffer size limit of 32000 bytes. The sum of all logged buffers for an Adabas Review command to this nucleus cannot exceed 10000 bytes.

```
ADARUN PROG=ADAREV,REVLOGMAX=10000
```

RVCLIENT Parameter: Adabas Review Client Reporting Activation

Parameter	Specify . . .	Possible Values	Default
RVclient	whether Adabas Review client reporting should be activated when you want to run client reports in batch environments.	ACTIVE | INACTIVE	INACTIVE

This ADARUN parameter allows you to activate Adabas Review client reporting when you want to run client reports in batch environments. Specify "ACTIVE" to activate it; specify "INACTIVE" (or specify no setting, since INACTIVE is the default) if you do not want client reporting activated.

Note: This ADARUN parameter is valid only in z/OS environments.

Example

In the following example, client reporting is activated.

```
ADARUN PROGRAM=USER,RVCLIENT=ACTIVE
```

SUBMPSZ Parameter: GETMAIN Memory Pool for Subtasks

Parameter	Specify . . .	Possible Values	Default
SUBMPSZ	the common memory pool size, in bytes, for subtask communication in products such as Adabas Review, Adabas Parallel Services, and Event Replicator for Adabas.	100000 - address-limit	1,024,000

This parameter is required for BS2000 nuclei that run subtasks. These may be Adabas Review, Adabas triggers and stored procedures, or Event Replicator for Adabas running EntireX Broker. Recommended values with any of these subtasks running are shown in the table below:

Subtask	Recommended SUBMPSZ Value
Adabas Review	14 M
Adabas triggers and stored procedures	20 M
Event Replicator for Adabas running webMethods EntireX Broker	200M (or larger)

Notes:

1. Setting this parameter for Adabas Review replaces an optional zap for increasing the subtask common memory.
2. This parameter must be set to the recommended value for the Adabas Review hub and the Adabas Review nuclei, irrespective of the value of the REVIEW parameter.
3. For Adabas triggers and stored procedures in BS2000 environments, make sure that the nucleus is started with the ADARUN parameter SUBMPSZ set to "20M" (or larger). Otherwise, the Natural subtask will deliver a "ADAI2S - 04000004 no mother task common memory" error.

Example

The following example allows for four (4) megabytes of common memory pool storage for use in the communication between the Adabas nucleus and the subtasks.

```
ADARUN PROG=ADANUC,SUBMPSZ=4096000
```

SVC Parameter: SVC Number

This parameter applies to the operating environments z/OS and z/VSE only.

Parameter	Specify . . .	Possible Values	Default
SVC	the Adabas SVC number or Adabas Review hub SVC number to be used for the session.	see text	45 (z/VSE) 249 (z/OS)

The SVC number is specified as an integer. It must correspond to the number used for the Adabas SVC at your installation.

The Adabas SVC or Adabas Review hub SVC are used to perform various Adabas internal functions under z/OS and z/VSE.

Valid SVC values are as follows:

z/OS 200-255

z/VSE 45 is recommended; any free SVC value can be used. See the Adabas Installation documentation for information about finding free values for z/VSE.

Example

The following example runs an Adabas session under z/OS using SVC 202 for the Adabas SVC.

```
ADARUN PROG=ADANUC,SVC=202
```

The following example runs an Adabas Review hub session under z/VSE using SVC 45 for the Adabas Review hub SVC.

```
ADARUN PROG=ADAREV,SVC=45
```

Index

Symbols

A

B

C

D

E

F

G

H

I

J

L

M

N

T

U

V

W