

Report Description

The ADAREP database status report contains general database information followed by information about the status, allocation, and definition of each file in the database. Although the report is designed for printing from the SYSLST (BS2000), DDRUCK (z/OS or z/VM), or SYS009 (VSE) data set, the following figures show examples of the report output displayed at a terminal. The following pages display sections in the order they appear in the report; a description of each part is provided on the same page or the facing page.

This chapter covers the following topics:

- General Database Information
 - File Information
 - Checkpoint Information
-

General Database Information

The first section contains general information about the database and its physical layout:

```
*****
* DATA BASE REPORT *                               yyyy-mm-dd hh:mm:ss
*****

DATA BASE NAME = EXAMPLE-DB
DATA BASE NUMBER = 99
DATE LOADED = yyyy-mm-dd
TIME LOADED = hh:mm:ss
SYSTEM FILES = 10
TRIGGER FILES = 6
MAXIMUM NUMBER OF FILES = 15
NUMBER OF FILES LOADED = 3
CURRENT LOG TAPE NUMBER = 48
RABNSIZE = 3
RECOVERY AID = NO
```

Additionally, if universal encoding support (UES) is enabled (UES=YES), the following encoding information is displayed:

```
UNIVERSAL ENCODING SUP. = YES
ALPHA FILE ENCODING = 37
WIDE FILE ENCODING = 4095
ALPHA ASCII ENCODING = 437
WIDE USER ENCODING = 950
```

If UES=NO, this information is suppressed.

Field	Explanation
DATABASE NAME	Name assigned to the database. See the ADADEF utility, DBNAME parameter.
DATABASE NUMBER	Number (ID) assigned to the database. See the ADADEF utility, DBIDENT parameter.
DATE LOADED	Date the database was initially defined.
TIME LOADED	Time of day when the database was initially defined.
SYSTEM FILES	File numbers of Adabas system files.
TRIGGER FILE	If the database contains a trigger file, this entry displays the file number. If no trigger file exists in the database, this line does not print.
MAXIMUM NUMBER OF FILES	Maximum number of files permitted for the database. See the ADADEF utility, MAXFILES parameter.
NUMBER OF FILES LOADED	Number of files currently in the database.
CURRENT LOG TAPE NUMBER	Number of the most recent data protection log for the database.
RABNSIZE	Length of the blocks in the database. RABNSIZE=3 indicates 24-bit blocks; RABNSIZE=4 indicates 31-bit blocks.
RECOVERY AID	Whether the Adabas Recovery Aid (ADARAI) is active for the database.
UNIVERSAL ENCODING SUPPORT	Whether universal encoding support (UES) is active for the database.
ALPHA FILE ENCODING	Current file encoding set for alphanumeric (A) format fields in the database. Must be EBCDIC-compatible.
WIDE FILE ENCODING	Current file encoding set for wide-character (W) format fields in the database.
ALPHA ASCII ENCODING	Current user encoding set for alphanumeric (A) format fields in the database. Must be ASCII-compatible.
WIDE USER ENCODING	Current user encoding set for wide-character (W) format fields in the database.

Space Allocated to Database Components

The "physical layout" table lists the space allocations for the major components of the database (Associator, Data Storage, and Work).

The "unused storage" table lists the unused space in the Associator and Data Storage areas. This space is not assigned to any file in the database.

P H Y S I C A L L A Y O U T												
DD- NAMES	I I	DEV TYPE	I I	NMBR OF CYLS	I I	NMBR OF BLOCKS	EXTENTS IN FROM TO	BLK. I	BLOCK LNNGTH	I I	NMBR OF M-BYTE	I I
ASSOR1	I	3380	I	100	I	28481	1 28481	I	2004	I	54	I
DATAR1	I	3380	I	200	I	26991	1 26991	I	4820	I	124	I
WORKR1	I	3380	I	40	I	5391	1 5391	I	4820	I	24	I

U N U S E D S T O R A G E												
DD- NAMES	I I	DEV TYPE	I I	NMBR OF CYLS	I I	NMBR OF BLOCKS	EXTENTS IN FROM TO	BLK. I	BLOCK LNNGTH	I I	NMBR OF M-BYTE	I I
ASSOR1	I	3380	I	98	I	28134	328 28461	I	2004	I	54	I
DATAR1	I	3380	I	198	I	26811	131 26941	I	4820	I	124	I

The columns in these tables provide the following information:

Column	Explanation
DDNAMES	The job/task control name (without the "DD" prefix) that defines the Associator, Data Storage, or Work component of the database.
DEV TYPE	The physical device containing the Associator, Data Storage, or Work component.
NMBR OF CYLS	The DASD cylinders allocated to the Associator, Data Storage, and Work components. If less than one full cylinder has been allocated, "0" is shown in this column.
NMBR OF BLOCKS	The total number of blocks assigned to the Associator, Data Storage, or Work component. Please note that for Data Storage, Associator, and Work, the first track is not used. ADAREP only shows the number of blocks that are used by Adabas, and not the blocks that are allocated and formatted for use.
EXTENTS IN BLK	The extents, listed by block range.
BLOCK LNNGTH	The block size. The block size depends on the component and the device type.
NUMBER OF M-BYTES	The component storage size, in megabytes.

Contents of the Database: General File Status

The next section contains information on the status of each file in the database:

```

*****
*
* CONTENTS OF DATABASE 99 (EXAMPLE-DB) *      yyyy-mm-dd hh:mm:ss
*
*****

FILE          NAME          LOADED          TOP-ISN    MAX-ISN    EXTENTS    PADDING
              NUA      D      A%      D%

      1  EMPLOYEES  1995-10-27  1107          2003    111    1    10    10
      2  VEHICLES  1995-10-27   773          2003    111    1    10    10
     10  CHECKPOINT 1995-10-27    3            667    111    1    10    10
    
```

The columns in this table provide the following information:

Column	Explanation
FILE	Adabas file number.
NAME	File name (see the ADALOD utility, NAME parameter).
LOADED	Date the file was loaded.
TOP-ISN	Highest ISN currently used in the file.
MAX-ISN	Highest ISN that can be assigned to a record in the file (see the ADALOD utility, MAXISN parameter).
EXTENTS	Number of logical extents currently assigned to the normal index (N), upper index (U), address converter (A), and Data Storage (D). A maximum of 5 logical extents may be allocated to an element. If an element has been assigned 5 extents, reorder the file (using ADAORD REORFILE or the ADAULD, ADADBS DELETE, ADALOD LOAD utility sequence) before the last extent fills, or Adabas will lock the file.
PADDING	The block padding factor defined for the Associator (A) and Data Storage (D) (see the ADALOD utility, ASSOPFAC and DATAPFAC parameters).

File Options

The next section lists the file options that are active for each file in the database:

```

*****
* FILE OPTIONS *
*****

      ADAM FILE
      . COUPLED FILE
      . . ISNREUSE
      . . . DSREUSE
      . . . . CIPHERED FILE
      . . . . . EXPANDED FILE
      . . . . . . USERISN
      . . . . . . . NOACEXTENSION
      . . . . . . . . MIXDSDEV
      . . . . . . . . . PGMREFRESH
      . . . . . . . . . . MULTICLIENT FILE
      . . . . . . . . . . . INDEX COMPRESSED FILE NAME
      . . . . . . . . . . . .

-----
  1 EMPLOYEES      . C I D . . . . .
  2 VEHICLES      . C . D . . . . .
 10 CHECKPOINT    . . . D . . . . .
    
```

Options that are active for a file are indicated by the following codes in the row containing the file name:

Code	Explanation
A	ADAM file. The file was loaded with the ADAM option.
C	Coupling, ciphering, or index compression. The file is coupled to one or more files, and/or the file data is ciphered, and/or the file index is compressed.
D	Space reuse. Space which has been released within a block as a result of a record deletion may be used for a new record.
I	ISN reuse. ISNs of deleted records may be reassigned to new records.
M	MIXDSDEV active (multiple Data Storage device types) and/or a multiclient file.
N	File is defined with the NOACEXTENSION option.
P	PGMREFRESH is active.
U	File was loaded with the USERISN option.
X	File is a component of an expanded file.

File Space Allocations

The next section shows the space allocated for each file in the database:

```

*****
* FILE SPACE ALLOCATIONS *
*****

FILE      NAME      ALLOC.: NI      UI      AC      DATA/CYL
      UNUSED:

1      EMPLOYEES      100      30      03      80/0
1              24      17
2      VEHICLES      10      20      03      30/0
2              03      02      12/0
10     CHECKPOINT    10      01      01      20/0
10              05      0       11/0
    
```

Each file listed has two rows in the file space allocations table. The first row shows the number of blocks and cylinders *allocated* . The second row shows the number of blocks and cylinders currently *unused*.

The first two columns give the number and logical name of the file. The remaining columns provide the following information:

Column	The number of ...
NI	blocks for the normal index.
UI	blocks for the upper index.
AC	blocks for the address converter.
DATA/CYL	blocks and cylinders for Data Storage.

Physical Layout of the Database

The next section lists all space allocations for the database in RABN sequence. RABNs allocated to the Associator are listed first, followed by RABNs allocated to Data Storage.

```

PHYSICAL LAYOUT OF THE DATABASE
                                                    yyyy-mm-dd hh:mm:ss

FROM      TO      NUMBER      DEV      TABLE      FILE      VOLSER
BLK      BLK      OF BLKS      TYPE      TYPE
106 - 119      14      3380      DSST      00      ADA001
120 - 120      01      3380      AC      10      ADA001
121 - 121      01      3380      UI      10      ADA001
122 - 131      10      3380      NI      10      ADA001
132 - 134      03      3380      AC      01      ADA001
135 - 164      30      3380      UI      01      ADA001
165 - 264      100     3380      NI      01      ADA001
265 - 267      03      3380      AC      02      ADA001
268 - 287      20      3380      UI      02      ADA001
288 - 327      10      3380      NI      02      ADA001
328 - 28481    28154   3380      UNUSED   00      ADA001
01 - 20        20      3380      DS      10      ADA002
21 - 100       80      3380      DS      01      ADA002
101 - 130      30      3380      DS      02      ADA002
131 - 26991    26861   3380      UNUSED   00      ADA002
    
```

Note:

Normally, a gap in the physical layout table is accompanied by an error message pointing to the gap. However, this is not the case for the physical layout of a file save. Since the file save contains only the FCBs of the saved files, there will be gaps in the physical layout table and these are reported as 'unknown' ranges.

The columns in this table provide the following information:

Column	Explanation
FROM BLK	The RABN of the first block in the logical extent.
TO BLK	The RABN of the last block in the logical extent.
NUMBER OF BLKS	The number of blocks contained within the extent.
DEV TYPE	The physical device type.
TABLE TYPE	The element for which the allocation was made: AC address converter NI normal index UI upper index DS Data Storage DSF Delta Save logging area DSST Data Storage space table UNUSED available space
FILE	The file for which the allocation was made. Zero indicates that the extent is not related to a particular file.
VOLSER NUMBER	The serial number of the volume on which the extent is contained. This is shown for Data Storage only if the Data Storage data set are present in the JCL.

File Information

General Characteristics

Detailed information on each file in the database is provided after the database information. This information can be limited to certain files or omitted altogether. The first part of this section displays information about the file's characteristics:

```

*****
* FILE 01 *      EMPLOYEES                               yyyy-mm-dd hh:mm:ss
*****

TOP-ISN          = 1,107                                HIGHEST INDEX LEVEL = 3
MAX-ISN EXPECTED = 2,003                                PADDING FACTOR ASSO = 10%
RECORDS LOADED   = 1,107                                PADDING FACTOR DATA = 10%
MIN-ISN          = 1                                    LENGTH OF CLIENT NR  = 0
NUMBER OF UPDATES = 0                                    ISNSIZE              = 3

MAX COMP REC LEN = 4,734                                DATE LOADED          = 1995-01-29
BLK/ADD DS EXT   = 0                                    TIME LOADED          = 13:30:14
BLK/ADD UI EXT   = 0                                    DATE OF LAST UPDATE  = 1997-01-15
BLK/ADD NI EXT   = 0                                    TIME OF LAST UPDATE  = 23:45:10

FILE ALPHA CODE  = 500
FILE WIDE CODE   = 4,095
USER WIDE CODE   = DB DEFAULT

```

The following information is provided:

Field	Explanation
TOP-ISN	Highest ISN currently used in the file.
MAX-ISN EXPECTED	Highest ISN planned for the file. See the ADALOD utility, MAXISN parameter.
RECORDS LOADED	Number of records currently contained in the file.
MINIMUM ISN	Lowest ISN that can be assigned to a record in the file. See the ADALOD utility, MINISN parameter.
NUMBER OF UPDATES	Number of updates that have been applied to the file after it was loaded.
MAX COMP REC LENGTH	Maximum compressed record length permitted for the file. See the ADALOD utility, MAXRECL parameter.
BLK/ADD DS EXT	Maximum number of blocks which may be allocated for each Data Storage secondary extent. See the ADALOD utility, MAXDS parameter.
BLK/ADD UI EXT	Maximum number of blocks which may be allocated for each secondary upper index extent. See the ADALOD utility, MAXUI parameter.
BLK/ADD NI EXT	Maximum number of blocks which may be allocated for each secondary normal index extent. See the ADALOD utility, MAXNI parameter.
FILE ALPHA CODE	Current file encoding set for alphanumeric fields in the file. This information is not displayed if UES=NO.
FILE WIDE CODE	Current file encoding set for wide-character fields in the file. This information is not displayed if UES=NO.

Field	Explanation
USER WIDE CODE	Current user encoding set for wide-character fields in the file. This information is not displayed if UES=NO.
HIGHEST INDEX LEVEL	Highest index level currently active for the file.
PADDING FACTOR ASSO	Associator padding factor. See the ADALOD utility, ASSOPFAC parameter or the ADAORD utility, REORASSO and REORFASSO functions.
PADDING FACTOR DATA	Data Storage padding factor. See the ADALOD utility, DATAPFAC parameter or the ADAORD utility, REORDATA and REORFDATA functions.
LENGTH OF CLIENT NR	Length of the owner ID for a multiclient file.
ISNSIZE	Whether the file contains 3-byte or 4-byte ISNs.
DATE LOADED	Date the file was loaded.
TIME LOADED	Time the file was loaded.
DATE OF LAST UPDATE	Date the file was last changed.
TIME OF LAST UPDATE	Time the file was last changed.

Options

File-option settings for the file are displayed next:

ADAM FILE	NO
CIPHERED FILE	NO
ISN REUSAGE	NO
SPACE REUSAGE	YES
COUPLED FILES	NONE
EXPANDED FILE	NO
USERISN	NO
NOACEXTENSION	NO
MIXDSDEV	NO
PGMREFRESH	NO
MULTICLIENT FILE	NO
PRIVILEGED USAGE	NO
ONLINE INVERT	NONE
INDEX COMPRESSED	NO
ADABAS VERSION NEEDED FOR THIS FILE: V71 OR LATER	

Field	Indicates . . .
ADAM FILE	whether the file was loaded with the ADAM option.
CIPHERED FILE	whether the file was loaded with the cipher option.
ISN REUSAGE	whether the file ISNs can be reused.
SPACE REUSAGE	whether the file Data Storage space can be reused.
COUPLED FILES	the file(s) to which this file is physically coupled.
EXPANDED FILE	whether the file is part of an expanded file; if so, the number of the expanded file is displayed.
USERISN	whether the file was loaded with the USERISN option.
NOACEXTENSION	whether the file permits increasing the MAXISN setting.
MIXDSDEV	whether the file Data Storage extents can be on different device types.
PGMREFRESH	whether the file can be refreshed using the E1 command.
MULTICLIENT FILE	whether the file can contain records belonging to multiple owners/owner IDs.
PRIVILEGED USAGE	whether the file was locked by the nucleus for privileged usage; if so, only Adabas utilities are allowed to access the file.
ONLINE INVERT	the descriptor(s) being inverted online.
INDEX COMPRESSED	whether the file index is compressed.

Delta Save Change Flags

If the Delta Save Facility is installed on the database and delta save logging is enabled, ADAREP shows the delta save change flags for each file:

```

DELTA SAVE CHANGE FLAGS:
SAVE ENTIRE INDEX      = [YES | NO]
SAVE ENTIRE ADDR CONV = [YES | NO]
SAVE ENTIRE DATA STOR = [YES | NO]
TOTAL CHANGES BY UTILITIES = nnn BLOCKS

```

Each flag indicates whether all of the index, address converter, or Data Storage, respectively, of the file have been changed by a utility and will be saved entirely in the next delta save operation.

The "total changes by utilities" include the blocks within extents that will be saved entirely as well as the blocks changed by ADALOD UPDATE executions.

Space Allocation

The next section lists the space allocations for the file:

LIST TYPE	DEV TYPE	BLOCK LNTH	SPACE BLOCKS	ALLOC. CYL	FROM RABN	TO RABN	UNUSED SPACE BLOCKS	CYL				
DSST	I	3380	2004	I	1	0	I	106	106	I		
AC	I	3380	2004	I	3	0	I	132	134	I		
UI	I	3380	2004	I	30	0	I	135	164	I	17	0
NI	I	3380	2004	I	100	0	I	165	264	I	24	0
DS	I	3380	4820	I	80	0	I	21	100	I	31	0

The space allocations table provides the following information:

Column	Explanation
LIST TYPE	The database component: AC address converter NI normal index UI upper index DS Data Storage DSF File-specific delta save logging area DSST Data Storage space table UNUSED Available space
DEV TYPE	Physical device containing the component.
BLOCK LNTH	Block length depends on the component and device type.
SPACE ALLOC.	Total number of blocks and cylinders allocated to the component; "0" indicates less than one full cylinder.
FROM RABN	RABN of the first block in the logical extent.
TO RABN	RABN of the last block in the logical extent.
UNUSED SPACE	Number of allocated blocks and cylinders but currently unused; "0" indicates less than one full cylinder.

Field Definition Table

The field definition table (FDT) is displayed next. This information can be omitted.

FIELD DESCRIPTION TABLE									
LEVEL	I	I	I	I	I	I	I	I	I
	NAME	LENGTH	FORMAT	OPTIONS	PARENT OF				
	I	I	I	I	I	I	I	I	I
1	AA	8	A	DE, UQ					
1	AB								
2	AC	20	A	NU					
2	AE	20	A	DE	SUPERDE, PHONDE				
2	AD	20	A	NU					
1	AF	1	A	FI					
1	AG	1	A	FI					
1	AH	6	U	DE					
1	A2								
1	AO	6	A	DE	SUBDE, SUPERDE				
1	AQ			PE					
2	AR	3	A	NU	SUPERDE				
2	AS	5	P	NU	SUPERDE				
1	A3								
2	AU	2	U		SUPERDE				
2	AV	2	U	NU	SUPERDE				

Field	Explanation
LEVEL	Field level.
NAME	Field name.
LENGTH	Field length, in bytes.
FORMAT	Field's data type: A alphanumeric B binary F fixed point P packed decimal G floating point U unpacked decimal W wide-character
OPTIONS	DE Descriptor FI Fixed storage LA Long alphanumeric MU Multiple-value field NC Null/not counted Null not allowed NU Null value suppression NV Not converted (alpha and wide-character fields) PE A periodic group. The fields composing the periodic group are those which follow and have a higher level number. UQ Unique descriptor XI Index (occurrence) number excluded from UQ in PE
PARENT OF	Shows whether this field is a parent field for a collation descriptor, sub/superfield, sub/superdescriptor, hyperdescriptor, or phonetic descriptor.

Special Descriptors

The next section displays information about any special descriptors (collation descriptors, subdescriptors, subfields, superdescriptors, superfields, phonetic descriptors, and hyperdescriptors) in the file:

SPECIAL DESCRIPTOR TABLE							
TYPE	NAME	LENGTH	FORMAT	OPTIONS	STRUCTURE		
SUPER	H1	4	B	DE,NU	AU (1 - 2)		
SUB	S1	4	A	DE	AV (1 - 2)		
SUPER	S2	26	A	DE	AO (1 - 4)		
SUPER	S3	12	A	DE,NU,PE	AO (1 - 6)		
PHON	PH				AE (1 - 20)		
COL	Y1	20	W	DE	AR (1 - 3)		
COL	Y2	12	A	DE,NU,PE	AS (1 - 9)		
					PH = PHON(AE)		
					CDX 8,PA		
					CDX 1,AR		

Along with the name, length, and format of each special descriptor, this table provides the following information:

Column	Explanation
TYPE	SUB Subfield/subdescriptor SUPER Superfield/superdescriptor PHON Phonetic descriptor HYPER Hyperdescriptor COL Collation descriptor
OPTIONS	DE Descriptor field FI Fixed point LA Long alphanumeric MU Multiple-value field NC Null not counted (SQL null representation) NN Null not allowed NU Null value suppression NV Not converted (alpha and wide-character fields) PE Periodic group UQ Unique descriptor XI Index (occurrence) number excluded from UQ in PE
STRUCTURE	The component fields and field bytes of the sub-, super-, or hyperdescriptor. Phonetic descriptors show the equivalent alphanumeric elementary fields. Collation descriptors show the associated collation descriptor user exit and the name of the parent field.

Checkpoint Information

Checkpoint information is also provided if the CPLIST or CPEXLIST parameters are specified:

```

*****
* CHECK-POINT-LIST *
*****
                                     yyyy-mm-dd hh:mm:ss

CP      CP      DATE      TIME      PLOG      BLOCK      JOBNAME
NAME    TYPE
        USER TYPE
        VOLSER NR....

SYNP    30      1995-06-03  14:07:38  47        1          DUAL GA0TB1
        LOAD
        VOLSER = WRK001
SYNC    01      ET  1995-06-03  14:08:16  48        2          DUAL GANUC70A
        SESSION OPEN IGNDIB=N FORCE=N
SYNP    1C      UTI 1995-06-03  14:08:36  48        3          DUAL GA0TB1
        RESTRUCT

```

The columns in this table provide the following information:

Column	Explanation
CP-NAME	<p>The checkpoint identifier. In the case of a user non-synchronized checkpoint, this is the checkpoint identifier supplied by the user program. Checkpoint names starting with "SYN" are reserved for the Adabas nucleus and utilities:</p> <p>SYNC A synchronized checkpoint made during nucleus initialization, including the status of the ADARUN IGNDIB and FORCE parameters.</p> <p>SYNF A checkpoint taken by a user program or utility that requires exclusive (EXF) control of one or more files.</p> <p>SYNP A checkpoint from a utility that requires privileged control. Such a utility can perform updating without using the Adabas nucleus.</p> <p>SYNS A checkpoint from Adabas Online System (SYSAOS) or ADADBS with three exceptions from the nucleus. The function identified by this checkpoint is implemented without user intervention during regeneration.</p> <p>Exceptions include a second SYNS 5B recorded at the end of a nucleus session; SYNS 60 recorded at an interval specified by the ADARUN INTNAS parameter; and SYNS 61 recorded when more space is allocated for a file.</p> <p>SYNV Indicates that a volume ID changed during sequential write to a data set is being closed.</p> <p>SYNX A checkpoint from a utility requiring exclusive control (EXU) of one or more files.</p> <p>SYN1 A checkpoint made at the beginning of online ADASAV execution (SAVE database function).</p> <p>SYN2 A checkpoint made at the end of online ADASAV execution (SAVE database function).</p> <p>SYN4 A checkpoint made at the beginning of online ADASAV execution (SAVE files operation).</p> <p>SYN5 A checkpoint made at the end of online ADASAV execution (SAVE files operation).</p>
CP TYPE	The checkpoint number. See the following table of checkpoints for the possible checkpoint numbers.

Column	Explanation
USER TYPE	The Adabas user type that set the checkpoint. The user types are: ET ET user EXF exclusive-file-control user or utility (privileged user) EXU exclusive-file-update user or utility UTI utility-update-control utility (privileged user) UTS Online ADASAV SAVE file (privileged user)
DATE TIME	The date and time the checkpoint was taken.
PLOG NR.	The number of the data protection log in use when the checkpoint was written to the checkpoint file.
BLOCK NR.	The block number of the data protection log in which the checkpoint was written.
VOLSER-NUMBER	The volume serial number of the sequential protection (DD/SIBA) log. The volume serial number is "DUAL" if dual logging is used and "MULTI" if multiple logging is used.
JOBNAME	The name of the job that created the checkpoint.

The following table describes the checkpoints written by the Adabas nucleus or utilities:

Type	Name	Originator	Description
01	SYNC	ADANUC	Written by nucleus at start of nucleus session.
01	SYNF	User/Util.	User/utility session OPEN with files used in EXF (exclusive use) mode.
01	SYNX	EXU user	EXU user open.
02	SYNV	ADANUC	VOLSER entry. Written at volume switch on DD/SIBA and at the end of the session if sequential logging is used.
03	SYNF	User/Util.	Close checkpoint for an EXF user.
03	SYNX	EXU	Close checkpoint for an EXU user.
05	SYNP	ADASAV	SAVE file(s)-start of operation
06	SYNP	ADASAV	SAVE database-start of operation
07	SYNP	ADASAV	RESTORE file(s)-end of operation
08	SYNP	ADASAV	RESTPLOG-end of operation
09	SYNV	ADASAV	SAVE file(s), VOLSER entry. Written at volume change on DD/SAVE and at SAVE-operation end.
0A	SYNV	ADASAV	SAVE database, VOLSER entry. Written at volume switch on DD/SAVE and at SAVE-operation end.

Type	Name	Originator	Description
0B	SYNP	ADASAV	SAVE DELTA-end of operation
0C	SYNP	ADASAV	RESTORE DELTA-end of operation
0D	SYNP	ADASAV	MERGE-end of operation
0E	SYNV	ADASAV	SAVE DELTA, VOLSER entry
0F	SYNV	ADASAV	MERGE, VOLSER entry
10	SYNP	ADAINV	COUPLE files
11	SYNP	ADAINV	INVERT field(s)
15	SYNP	ADAORD	REORDER Associator database
16	SYNP	ADAORD	REORDER Data Storage database
17	SYNP	ADAORD	REORDER database
18	SYNP	ADAORD	REORDER Associator file
19	SYNP	ADAORD	REORDER Data Storage file
1A	SYNP	ADAORD	REORDER file
1B	SYNP	ADAORD	STORE
1C	SYNP	ADAORD	RESTRUCTURE
1D	SYNP	ADADEF	DEFINE NETWORK
1E	SYNP	ADADEF	MODIFY default character encodings
22	SYNX	ADARES	REGENERATE file
23	SYNX	ADARES	BACKOUT file
24	SYNX	ADARES	REGENERATE all; CPEXLIST lists excluded files
25	SYNX	ADARES	BACKOUT all; CPEXLIST lists excluded files
26	SYNP	ADARES	REPAIR Data Storage
27	SYNV	ADARES	COPY sequential protection log
28	SYNP	ADARES	PLCOPY function successfully completed
28	SYNV	ADARES	PLCOPY dual or multiple protection log
29	SYNV	ADARES	CLCOPY dual or multiple command log
2A	SYNP	ADARES	PLCOPY MERGE function successfully completed
2A	SYNV	ADARES	PLCOPY MERGE dual or multiple protection log
2B	SYNP	ADARES	CLOG MERGE function successfully completed
2B	SYNV	ADARES	CLOG MERGE dual or multiple command log
30	SYNP	ADALOD	LOAD file
31	SYNP	ADALOD	Mass update
35	SYNX	ADAULD	Unload file

Type	Name	Originator	Description
3F	SYNP	ADAZAP	Successful VERIFY - REPLACE
40	SYNS	SYSAOS	Add extent
41	SYNS	SYSAOS	CHANGE default field length
42	SYNS	SYSAOS	DECREASE database size
44	SYNS	SYSAOS	Delete file
45	SYNS	SYSAOS	INCREASE database size
47	SYNS	SYSAOS	RECOVER space
48	SYNS	SYSAOS	Refresh file
49	SYNS	SYSAOS	Remove component file from expanded-file chain
4A	SYNS	SYSAOS	Release descriptor
4B	SYNS	SYSAOS	RENAME file
4C	SYNS	SYSAOS	RENUMBER file
4D	SYNS	SYSAOS	RESET DIB
4E	SYNS	SYSAOS	Reuse ISN
4F	SYNS	SYSAOS	Reuse Data Storage
50	SYNS	SYSAOS	UNCOUPLE files
51	SYNS	SYSAOS	ALLOCATE file extent
52	SYNS	SYSAOS	DEALLOCATE file extent
53	SYNS	SYSAOS	Delete checkpoint
54	SYNS	SYSAOS	Set user priority
55	SYNS	SYSAOS	Modify FCB
57	SYNS	SYSAOS	DEFINE file
58	SYNS	SYSAOS	Write FDT
59	SYNS	SYSAOS	DEFINE new field
5B	SYNS	ADADBS	Write refreshed statistics (some or all per user request)
5B	SYNS	ADANUC	Write (all) statistics at end of nucleus session
5B	SYNS	ADARES	Write refreshed statistics (command, file, and thread usage; DRES and DSTAT)
5C	SYNS	SYSAOS	CHANGE default field format
5D	SYNS	SYSAOS	Change file encoding
60	SYNS	ADANUC	Nucleus statistic checkpoint
61	SYNS	ADANUC	Allocate file space
64	SYNS	ADASCR	Protect files

Type	Name	Originator	Description
65	SYNS	ADASCR	Protect fields
66	SYNS	SYSAOS	Link component file into expanded-file chain
68	SYNS	SYSAOS	Set USERISN on/off
69	SYNS	SYSAOS	Set MIXDSDEV on/off
6A	SYNS	SYSAOS	Install Delta Save DLOG area
6B	SYNS	SYSAOS	Change Delta Save DLOG area
6C	SYNS	SYSAOS	Remove Delta Save DLOG area
6F	SYNS	SYSAOS	Online process initiated
70	SYNS	SYSAOS	Online invert process
71	SYNS	SYSAOS	Online reorder process
73	SYNC	ADANUC	Nucleus (nuclei) successfully quiesced.
74	SYNC	ADANUC	Nucleus (nuclei) have resumed normal processing.