REORFASSO: Reorder Associator for a Single File

The REORFASSO function reorders the Associator for a single file. Associator information for unspecified files is not reordered.

This function requires exclusive EXU control of the database files involved in the operation. In addition, parts of the database are overwritten during ADAORD execution, so we recommend that you back up the database (or file) using the ADASAV utility first, before running ADAORD functions.

If the file specified for this function was originally loaded with ISNREUSE=YES active, this reorder function will reset the first unused ISN value in that file's control block (FCB) to the actual first unused ISN found in the address converter.

This is the syntax of the ADAORD REORFASSO function:

```
ADAORD REORFASSO FILE = file-number
              [ACRABN = starting-rabn]
              [AC2RABN = starting-rabn]
              [ALLOCATION = { FORCE | NOFORCE } ]
              [ASSOPFAC = padding-factor ]
              [ASSOVOLUME = 'Associator-extent-volume']
              [INDEXCOMPRESSION = { YES | NO } ]
              [ISNSIZE = \{3 \mid 4\}]
              [MAXISN = highest-isn ]
              [MAXISN2 = highest-isn]
              [NIRABN = starting-rabn]
              [NIRELEASE]
              [NISIZE = size]
              [PASSWORD = password]
              [UIRABN = starting-rabn ]
              [UIRELEASE]
              [UISIZE = size ]
           [EXCLUDE = file-list ]
           [LPB = prefetch-buffer-size]
           [NOUSERABEND]
           [TEST]
```

This chapter covers the following topics:

- Essential Parameter
- Optional Parameters
- Examples

Essential Parameter

FILE: File Number

FILE specifies the file to be processed, and to which the parameters that follow in the statement sequence apply. Several files and their related parameters may be specified within one REORFASSO operation; see the examples at the end of this section. If a component file of an Adabas expanded file is specified, only that file's Associator is reordered; this has no adverse effect on the other component files.

Optional Parameters

ACRABN: Starting RABN for Address Converter

ACRABN specifies the file's starting address converter RABN. If this parameter is omitted, ADAORD assigns the starting RABN. The space requested must be available in one extent.

When specifying the starting RABN for Associator extents, the space needed for the FCBs, FDTs, and DSST should also be considered.

AC2RABN: Starting RABN for Secondary Address Converter

The beginning RABN for the file's secondary address converter extent. The secondary address converter is used to map the secondary ISNs of secondary spanned records to the RABNs of the Data Storage blocks where the secondary records are stored.

If this parameter is omitted, ADAORD assigns the starting RABN. The space requested must be available in one extent. If the file contains no secondary address converter extents, this parameter is ignored.

ALLOCATION: Action to Follow File Extent Allocation Failure

ALLOCATION specifies the action to be taken if file extent allocations cannot be obtained according to the placement parameters ACRABN, NIRABN, or UIRABN.

By default (that is, ALLOCATION=FORCE), the utility terminates with error if any file extent allocation cannot be met according to RABN placement parameters.

If ALLOCATION=NOFORCE is specified and any allocation with placement parameters fails, the utility retries the allocation without the placement parameter.

ASSOPFAC: Associator Padding Factor

ASSOPFAC defines the new Associator block padding factor, which is the percentage of each Associator block *not* used during the reorder process. Specify a value in the range 1-90. The number of bytes free after padding must be greater than the largest descriptor value plus 10.

If this parameter is omitted, the current padding factor in effect for the file is used.

ASSOVOLUME: Associator Extent Volume

Note:

The value for the ASSOVOLUME parameter must be enclosed in apostrophes.

ASSOVOLUME identifies the volume on which the file's Associator space (that is, the AC, NI, and UI extents) should be allocated. If the requested number of blocks cannot be found on the specified volume, ADAORD allocates the remaining blocks on other volumes according to its default allocation rules.

If ACRABN, UIRABN, or NIRABN is specified, ADAORD ignores the ASSOVOLUME value when allocating the corresponding extent type.

If ASSOVOLUME is not specified, the file's Associator space is allocated according to ADAORD's default allocation rules.

EXCLUDE: Exclude Specified Files from Reorder

EXCLUDE lists the numbers of the files to be excluded from REORDER processing; that is, the files that are not to be reordered.

The parameter is optional: if not specified, no files are excluded. A file number may be listed only once.

Files specified in the EXCLUDE parameter must also be specified in the FILE parameter.

The EXCLUDE parameter is provided for use in recovery jobs built by the Adabas Recovery Aid (ADARAI).

INDEXCOMPRESSION: Compress File Index

INDEXCOMPRESSION indicates whether the index for the file is rebuilt in compressed or uncompressed form. A compressed index usually requires less index space and improves the efficiency of index operations in the Adabas nucleus.

If INDEXCOMPRESSION is not specified, the default is the current form of the file.

ISNSIZE: 3- or 4-Byte ISN

ISNSIZE specifies whether ISNs in the file are to be 3 or 4 bytes long. The default is the value currently used for the file; this value is stored in the file control block (FCB).

Note:

It is not possible to change the ISNSIZE of a physically coupled file using ADAORD.

LPB: Prefetch Buffer Size

LPB specifies the size, in bytes, of the internal prefetch buffer. The maximum value is 32,760 bytes. The default depends on the ADARUN LU parameter. ADAORD may reduce a specified LPB value if the LU value is too small.

MAXISN: Highest ISN to Be Allocated

MAXISN is the highest ISN which may be allocated for the file. This value must be greater than the current TOPISN value displayed in the ADAREP database report.

ADAORD uses the specified value to calculate the address converter space required. If this parameter is omitted, the current MAXISN value for the file remains in effect.

MAXISN2: Highest Secondary ISN Permitted for the File

MAXISN specifies the desired size of the secondary address converter (AC2) in ISNs. This value must be greater than the current TOP AC2 ISN value displayed in the ADAREP database report. The secondary address converter is used to map the secondary ISNs of secondary spanned records to the RABNs of the Data Storage blocks where the secondary records are stored.

ADAORD uses the specified value to calculate the space required in the secondary address converter for the file. If this parameter is omitted, the current MAXISN2 value for the file is retained. If the file contains no secondary address converter extents, this parameter is ignored.

NIRABN: Starting RABN for Normal Index

NIRABN is the starting RABN to be used for the normal index. If NIRABN is omitted, ADAORD assigns the starting RABN.

NIRELEASE: Release Unused Normal Index Blocks

Specifying NIRELEASE releases unused normal index (NI) blocks belonging to the specified file. If NIRELEASE is not specified, ADAORD allocates *at least* the number of NI blocks that were allocated before the file was reordered.

Note:

Adabas calculates the file extent size using any changed padding factor or block size values *before* the file is reordered.

NISIZE: Normal Index Size

NISIZE specifies the number of blocks or cylinders to be allocated for the file's normal index. A block count must be followed by a "B" (for example, "2000B").

If this parameter is omitted, ADAORD computes the file extent size in proportion to any increase or decrease in the ASSOPFAC padding factor.

NOUSERABEND: Termination without Abend

When a parameter error or a functional error occurs while this utility function is running, the utility ordinarily prints an error message and terminates with user abend 34 (with a dump) or user abend 35 (without a dump). If NOUSERABEND is specified, the utility will *not* abend after printing the error message. Instead, the message "*utility* TERMINATED DUE TO ERROR CONDITION" is displayed and the utility terminates with condition code 20.

Note:

When NOUSERABEND is specified, we recommend that it be specified as the first parameter of the utility function (before all other parameters). This is necessary to ensure that its parameter error processing occurs properly.

PASSWORD: File Password

If the file is password-protected, use this parameter to specify the password.

TEST: Test Syntax

This parameter tests the operation syntax without actually performing the operation. Only the syntax of the specified parameters can be tested; not the validity of values and variables.

UIRABN: Starting RABN for Upper Index

UIRABN is the starting RABN for the upper index. If this parameter is omitted, ADAORD assigns the starting RABN.

UIRELEASE: Release Unused Upper Index Blocks

Specifying UIRELEASE releases unused upper index (UI) blocks belonging to the specified file. If UIRELEASE is not specified, ADAORD allocates *at least* the number of UI blocks that were allocated before the file was reordered.

Note:

Adabas calculates the file extent size using any changed padding factor or block size values *before* the file is reordered.

UISIZE: Upper Index Size

UISIZE specifies the number of blocks or cylinders to be allocated for the file's upper index. A block count must be followed by a "B" (for example, "2000B").

If this parameter is omitted, ADAORD computes the file extent size in proportion to any increase or decrease in the ASSOPFAC padding factor.

Examples

Example 1:

ADAORD	REORFASSO	FILE=9	
ADAORD			ASSOPFAC=5
ADAORD			FILE=23
ADAORD			UIRABN=3151,UISIZE=50B
ADAORD			NIRABN=3201

The Associator for files 9 and 23 is to be reordered; Associator data for other files is not changed.

The Associator padding factor is set to 5% for file 9. For file 23, the following Associator changes are being made: the new upper index starting RABN is 3151, with a new upper index size of 50 blocks. The new normal index starting RABN is 3201; the normal index size remains the same as before.

Example 2:

ADAORD	REORFASSO	FILE=104	
ADAORD			ASSOPFAC=5,NISIZE=5B,UISIZE=2B
ADAORD			ACRABN=10000,NIRABN=10510,UIRABN=10515
ADAORD			FILE=105

The Associator for files 104 and 105 is to be reordered; Associator information for all other files is unchanged.

For file 104, the Associator padding factor is to be set to 5. The sizes of the normal index and upper index are to be 5 blocks and 2 blocks respectively. The starting RABN for the address converter is to be 10000. The starting RABN for the normal index is to be 10510. The starting RABN for the upper index is to be 10515. Information for file 105 is reordered according to the file's existing definition.