ADAULD Input Processing

ADAULD is used to unload an Adabas file from

- a database; or
- a save tape (if the SAVETAPE keyword is specified).

Processing a Save Tape as Input

If a save tape is used as input, a DD/SAVE sequential file is expected. Database or file save tapes created online and offline are acceptable. The save tape must have been created using ADASAV version 5.1 or above.

The ADARUN DBID specified for the ADAULD run must match the DBID found on the save tape.

If the file has hyperdescriptors defined, the corresponding hyperexits must be specified in the ADARUN parameters for ADAULD. If the hyperexit routines are no longer available, the file must be unloaded with MODE=SHORT specified. See the *Adabas DBA Reference* documentation for more information about hyperexits.

For an "online" save tape:

- the corresponding protection log is expected as a DD/PLOG sequential input dataset.
- a temp (DD/TEMPR1) dataset is required as intermediate storage for the Data Storage blocks on the protection log. The TEMPSIZE and TEMPDEV parameters must be specified.

If an online save tape created using ADASAV version 5.1 is to be used, the additional parameters PLOGNUM and SYN1 or SYN4 must be specified:

- PLOGNUM specifies the number of the nucleus protection log used while the ADASAV SAVE operation was active; and
- SYN1 or SYN4 specifies the block number containing the SYN1 or SYN4 checkpoint at which the corresponding ADASAV SAVE operation began.

For online save tapes created using ADASAV version 5.2 or above, this information is included on the tape. You can specify PLOGNUM or SYN1 or SYN4 to override the tape information.

The ADAULD utility protocol on DD/DRUCK displays a short header indicating the kind of save tape encountered, when it was created, the version of ADASAV used to create it, the database ID found on the save tape, and for online save tapes, the session number of the corresponding protection log and the block number of the SYN1/SYN4 checkpoint:

```
ADAREP
         Vv.r
              SMs
                   DBID = nnnn STARTED
                                         yyyy-mm-dd
                                                  hh:mm:SS
PARAMETERS:
ADAULD UNLOAD FILE=3, SAVETAPE
 ***********
          ONLINE DATABASE SAVE
 UNLOAD FROM
               yyyy-mm-dd hh:mm:ss
 CREATED AT
 BY ADASAV VERSION V vr
 DBTB
               nnnnn
 DSID
               1 / 0 / yyyy-mm-dd hh:mm:ss
 PLOG SESSION NR
               17
 SYN1 BLOCK NR
                137
```

ADAULD first reads the file control block (FCB) and file definition table (FDT) from the save tape. Then:

- for "offline" save tapes, ADAULD scans the tape to find the file's Data Storage RABNs, extracts the Data Storage records, and for each Data Storage record, generates the descriptor values according to the FDT.
- for "online" save tapes, ADAULD scans the protection log and copies the latest version of each Data Storage block of the relevant file to the temp dataset. The location of a Data Storage block on the temp dataset is maintained in a directory in main memory. Then, ADAULD scans the save tape for Data Storage blocks of the file. If more recent versions of Data Storage blocks exist on the temp dataset, they are actually unloaded to DD/OUT1 or DD/OUT2. Note that in this case, two parallel tape units are required: concatenating the save tape and the protection log as for ADASAV RESTONL is not possible.

After opening the DD/SAVE and DD/PLOG input datasets, ADAULD cross-checks to ensure that the input tapes are correct. If an invalid save tape is encountered, ADAULD terminates and displays error-134 (invalid save tape supplied). If an invalid protection log tape is encountered, ADAULD terminates with error-135 (invalid protection log supplied).