COPYSD
Single-Disk Copy Utility

The Single-Disk Copy Utility (COPYSD) copies files from one FLEX™ diskette to another
later mounted on the same drive.   The files are buffered and packed in memory until all
requested files are in the copy buffer, or the copy buffer is full.   The second diskette
is then requested and the copy buffer flushed.   The first diskette is then requested
again, and if there is more data to be copied, the process continues, alternating
diskettes as necessary.

Program Calls:

COPYSD <file-list>

In this form of call, a list of files is provided by the user.   All files are assumed to
be on the work drive, and the default extension is "TXT".

The copy process begins with COPYSD posting the message

REQUEST FIRST DISKETTE

The diskette containing the files to be copied should be mounted on the drive and any
character (except "A", as noted below) is typed to start the copy process.   The files are
read from the first disk into memory until either all files are read, or the buffer is
filled.

When this occurs, COPYSD posts the following message:

REQUEST SECOND DISKETTE

The first diskette should be removed and the diskette to which the files are to be written
should be mounted. As with the request for the first diskette, any character typed will
indicate that the diskette is mounted and ready.   Afterwards, the first diskette is again
requested and the reading of the files continues if there is any unprocessed data.

During the copy operation, several informative message are issued.   An annotated summary
of these messages appears later on.

If an asterisk is typed instead of a <file-list>, all of the files from the first disk are
copied to the second disk.   If a file already exists on the second disk, COPYSD will ask
if the file may be deleted.   A single character answer ("Y" or "N") is sufficient.   If "N"
is typed, the file on the second disk is not replaced.

If the <file-list> is not specified, i.e. the command is only COPYSD, the program will
prompt for the file names, individually.   After each name is entered, the file is read
into the copy buffer.   If the file fits in the buffer, the prompt is issued again for
another file name.   If the file does not fit into the buffer, the second diskette is
requested and the copy buffer flushed.   Afterwards, the first diskette is requested and
the remainder of the file is read, followed by a prompt for another file name.   Responding
to the prompt with a carriage return will signal that there are no more files to be
copied, and the copy buffer will be flushed of any pending files.

Examples:

COPYSD TEST PROBLEM.BIN

This call would copy the files "TEST.TXT" and "PROBLEM.BIN".

COPYSD *

This call copies all of the files on the diskette.

COPYSD

This call will prompt the user for file names.

Aborting COPYSD

If the letter "A" is typed to any of the messages:

        REQUEST FIRST DISKETTE
        REQUEST SECOND DISKETTE
        DELETE?

then COPYSD will terminate immediately.

Protection Features

If a file cannot fit in memory, COPYSD must play a dangerous game by leaving FCBs open for
a file on a diskette which is not in the drive.   Because of this, it tries to be sure that
the diskette currently being read or written is the same one that was previously read or
written.   It does this by remembering the volume name, volume number, and creation date
for each of the two diskettes.   These values are checked each time a diskette is
requested.   The two diskettes must have different names, numbers, or dates. (Only one of
these three need differ; the other two may be the same.)   If they happen to be the same,
COPYSD will not write to the second diskette and will request another one.   If a diskette
is mounted which is not the one expected, COPYSD will issue a message and post the request
again.

MESSAGE SUMMARY

READING <file name> -- The file <file name> is currently being read from the diskette.

WRITING <file name> -- The file <file name> is currently being written on the diskette.

FILE PARTIALLY READ -- The file currently being read would not fit into the remaining
     space in the copy buffer.   The second diskette will be requested and the copy buffer
     flushed, including the first part of the file that did not fit.   The remainder of the
     file will be read after the first portion has been written to the second diskette.

FILE IGNORED - <file name> -- The file <file name> was ignored (not copied) for the reason
     given in some previous message.

INCOMPLETE FILE - <file name> -- The file <file name>, which was being written, could not
     be finished due to some error condition.   The data on the diskette is intact as far
     as it goes, but is not the complete file.

MOUNT FIRST DISKETTE -- This is a request for the diskette containing the files which are
     to be copied.   Typing any character (except "A") will indicate that the diskette is
     mounted and ready.   Typing the letter "A" will cause an immediate termination of the
     copy process.

MOUNT SECOND DISKETTE -- This is a request for the diskette to which the files will be
     written.   Typing any character (except "A") will indicate that the diskette is
     mounted and ready.   Typing the letter "A" will cause an immediate termination of the
     copy process.

FILES EXISTS - <file name> -- The file which is to be written next already exists on the
     second diskette. This message is followed by a delete request.

DELETE? -- This is a request to delete a file which already exists on the second diskette.
     A single character response of "Y" or "N" is to be used to indicate your decision.
     Typing the letter "A" to this request will cause the copy process to terminate
     immediately.

FILE NAME: -- This is a prompt for the name of the next file to be copied. This prompt is
     issued only if COPYSD is called with no arguments.   Typing a carriage return in
     response to the prompt indicates that there are no more files to be copied.

FILE DOES NOT EXIST - <file name> -- The file <file name> could not be found in the
     directory of the diskette containing the files to be copied.

FILE NAME ERROR -- An error was detected in parsing one of the file names specified.

FATAL ERROR IN DIRECTORY -- A fatal disk error was encountered when trying to read the
     directory of the diskette currently mounted.   It is likely that the copy process
     cannot be continued from this point.

WRONG DISKETTE -- The diskette just mounted for reading or writing is not the same as the
     one previously used for the same operation.

SAME LABEL AS FIRST DISKETTE -- The diskette just mounted as the second diskette has the
     same identification information (name, number, date) as the first diskette and thus
     cannot be distinguished from it.   A different diskette, having a name, number, or

date different from that on the diskette being read, must be used for the copies of the files.

COPY COMPLETED -- The copy operation is finished.