ELLIOTT 900

Volume 3: OPERATING INSTRUCTIONS

Part 2: PROGRAM OPERATING INSTRUCTIONS

Section 5: OPERATION OF UTILITY PROGRAMS

Contents

Chapter 1: T22-23

"DUMP USING T22"

1. 1 Introduction

T22 is distributed as a binary tape input by I.I. to produce a sum-checked binary (S. C. B.) tape of specified store locations.

The locations output may be defined by a data tape.

On input, T22 outputs a copy of T23. When T22 is entered, the specified blocks of store are output.

1. 2 Notes to Operators

The data tape consists of a pair of absolute addresses, each address preceded by + and terminated by a <newline> only. Where a program assembled in store is to be dumped, this pair of addresses consists of the addresses output under FIRST and LAST by SIR.

The data tape must end with a halt code.

1. 3 Operating Instructions

Step 1   Ensure that punch is loaded.

Step 2   "LOAD T22-23 UNDER I. I. "

Step 3   If teleprinter available
          "INPUT Data tape from TELEPRINTER at 9"
          see note below for data tape. *
          Else "LOAD DATA TAPE AT 9"
          *N. B. Do not remove data tape until halt
          code has been read.

Step 4   "LOAD OUTPUT TAPE UNDER INITIAL INSTRUCTIONS"

ERRORS: If any output occurs during Step 4, press "RESET" button and repeat step 4. If output still occurs, discard tape and return to step 2.

Chapter 2: EDIT

2. 1 Introduction

903 EDIT is distributed as a mnemonic tape and is used to produce a modified copy of a tape.

2. 2 Notes to Programmers

The name of the tape to be edited must be made clear to the operator, and the series of commands must be punched, checked and labelled 'EDIT STRING'.

If during editing, the input tape is expected to stop before the end of the tape (e. g. with command FC%) then the operator must be fore-warned, and the re-entry point clearly stated.

2. 3 Notes to Operators

The original tape must be returned to the programmer along with the new tape produced. The new tape must have the heading of the original tape, but the version number will be increased by 1 and the date of editing added. A tape of the EDIT program in sum-checked binary form should be produced for general use at each installation. This tape may be produced by Assembling 903 EDIT with SIR followed by "DUMP using T22" with the addresses output under FIRST and LAST by SIR as data for T22. The binary tape produced should be labelled 903 EDIT @ 32.

2. 4 Operating Instructions. "EDIT" Name 1

Step 1   Ensure that punch is loaded.

Step 2   "LOAD 903 EDIT @ 32 UNDER I. I. "

Step 3   "LOAD 'Edit string' at 32"

Step 4   "LOAD Name 1 at 33". See Note 1.
If tape 1 stop, before last character, see Note 2.
If tape 1 shoots through reader, see Note 3.

Step 5   Run out blank tape, tear off tape, wind, tape and label.

Step 6   "LOAD OUTPUT Tape at 37"

Note 1   Tape Name 1 should be loaded with approximately 6" of run out before first character.

Note 2   If input tape stops on

        (1)   A length of blank tape in middle of Name 1.
             "ENTER at 34"
             Return to step 5.

or   (2)   An odd parity character (i. e. an odd number of
             punched holes).
             "ENTER at 35"
             Return to step 5.   Make a note of the occurrence
             on the operating sheet.

or   (3)   An even parity character.
             "ENTER at 36"
             Return to step 5.

Note 3   If input tape shoots through reader,
           LOAD about 6" of runout in reader, press
           <READ> button.   Tape should come to a halt -
           If not, abandon edit.

ERRORS: If an error is output on reading edit string, i. e. at Step 2,
abandon edit.

    If error is output in step 6 repeat step 6.

    If error still output return all tapes to programmer with note
of error.

Chapter 3: QCOPY

"COPY USING QCOPY"

3.1 Introduction

QCOPY is issued as a sum-checked binary tape for input by I.I. and is used to copy and check large tapes.

3.2 Notes to Programmers

The instruction to use QCOPY must only be used for tapes too big to be copied by 'COPE TAPE', i.e. tapes approximately the size of the Algol Interpreter. The number of copies required must be clearly stated.

3.3 Notes to Operators

The original tape must be returned to the programmer along with the new tapes produced. These must bear the name of the original run with the date and issue number added, unless the programmer specifies another name.

3.4 Operating Instructions

"COPY USING QCOPY" Name 1.

Step 1   Ensure that the punch is loaded.

Step 2   "LOAD 903/QCOPY UNDER I.I."

Step 3   "LOAD Name 1 at 21" (Name 1 is the tape to be copied)

Step 4   Run out blanks on punch, tear-off, wind up tape and label.

Step 5   "LOAD OUTPUT at 22" (output refers to the tape produced)

ERRORS: If continuous output occurs after Step 5, press <RESET> button and repeat step 3. If continuous output again occurs, press 'RESET' button and return all tapes to programmer with notes on error. If the tape runs through the reader till the 'READ' lamp is lit, take the same action as for continuous output.

Chapter 4: COPY TAPE

4.1 Introduction

"Copy Tape" is issued as a sum-checked binary tape for input by Initial Instructions, to produce and check copies of a master tape.

There is a limit to the size of tapes that can be copied, since the master tape (i. e. the tape to be copied) is read into store before being checked and copied. Tapes too large to be output from store - e. g. the Algol Interpreter, may be copied directly by 'QCOPY'.

4.2 Notes to Programmers

The tape must not be too large to be copied by 'COPY TAPE'. The number of copies required must be specified.

4.3 Operating Instructions

"COPY USING COPY TAPE" Name 1

Step 1	Ensure that there is sufficient paper in punch.
Step 2	Turn up loudspeaker.
Step 3	"LOAD COPY TAPE UNDER I.I."
Step 4	"LOAD Name 1 at 21"
Step 5	Press RESET button.
Step 6	"LOAD Name 1 at 22"
Step 7	Press RESET button.
Step 8	"ENTER at 23" Punch will stop after about 6 ft of tape has been output. N. B. Do not tear off tape.
Step 9	"LOAD Blanks on output at 24" i. e. form loop between punch and reader.
Step 10	When number of copies desired have been output press RESET button. Runout blanks on punch, wind up each copy separately and label.

Step 11   "LOAD Name 1 at 22"

ERRORS: Errors are identified by a two-tone hoot on the loudspeaker.

Error in Step 4 - Tape too large to be copied by COPY TAPE:-
Return to programmer.

Error in Step 6 - Return to Step 2.

Error in Step 9 - Discard the copy which was being read when
the error occurred. Run out blanks and
return to Step 8.

Error in Step 11 - Discard all copies, return to Step 2.