

STOP

GENERAL FORM	EXAMPLES
"STOP" or "STOP n" where n is an unsigned octal fixed point constant.	STOP STOP 7777

This statement causes the machine to HALT in such a way that pressing the START button has no effect. Therefore, in contrast to the PAUSE, it is used where a get-off-the-machine stop, rather than a temporary stop, is desired. The octal number n is displayed on the 704 console in the address field of the storage register. (If n is not stated it is taken to be 0.)

DO

GENERAL FORM	EXAMPLES
"DO n i = m ₁ , m ₂ " or "DO n i = m ₁ , m ₂ , m ₃ " where n is a statement number, i is a non-subscripted fixed point variable, and m ₁ , m ₂ , m ₃ are each either an unsigned fixed point constant or a non-subscripted fixed point variable. If m ₃ is not stated it is taken to be 1.	DO 30 I = 1, 10 DO 30 I = 1, M, 3

The DO statement is a command to "DO the statements which follow, to and including the statement with statement number n, repeatedly, the first time with $i = m_1$ and with i increased by m_3 for each succeeding time; after they have been done with i equal to the highest of this sequence of values which does not exceed m_2 let control reach the statement following the statement with statement number n".

The *range* of a DO is the set of statements which will be executed repeatedly; it is the sequence of consecutive statements immediately following the DO, to and including the statement numbered n.

The *index* of a DO is the fixed point variable i, which is controlled by the DO in such a way that its value begins at m_1 and is increased each time by m_3 until it is about to exceed m_2 . Throughout the range it is available for computation, either as an ordinary fixed point variable or as the variable of a subscript. During the last execution of the range, the DO is said to be *satisfied*.

Suppose, for example, that control has reached statement 10 of the program

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10 DO 11 I = 1, 10
11 A(I) = I*N(I)
12

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