

- 14 -

1 If more than 47 features are defined, multiple calls
are made by specifying WORDNUM = 2 for features 48-94,
WORDNUM = 3 for features 95-141 and so forth. Using
the equations given above, the feature number is defined
5 by (Bit# + 47(WORDNUM - 1)). The last MCPTCUFEATURES
word sent specifies LASTCALL = TRUE.

When a feature bit is assigned, it is
characterized by both the MCP and TCU microcode as either
optional or required. Required features must be supported
10 by both the MCP and TCU microcode. If a required feature
is not mutually supported, the MCP will DEADSTOP the
system. Optional features need not be supported by both.
If an optional feature is not supported by both the MCP
and TCU microcode, the feature is not used. For each
15 call to this interface, the TCU microcode returns its
corresponding MCPTCUFEATURES word as specified by WORDNUM.

Thus it is appreciated that this MCP to TCU
function interface is defined to support feature
coordination.

20 Referring to Figures 3(a) and 3(b) with continued
reference to the preceding figures, a flow chart is
illustrated describing how the TCU_EXCHANGE_FEATURES
interface 16 is used during system initialization, IOM
reconfiguration and microcode load by both the MCP and
25 TCU microcode. The initial value of <n> is "1". In
the flow chart, comments are preceded by "%".
Additionally, a data word followed by "&<k>[:1]" is
a bit set operation. It sets bit to <k> where k
is 0 or 1. The blocks of the flow chart illustrated
30 in Figure 3(a) are identified by reference numerals
100-104, respectively, and the blocks of the flow chart
illustrated in Figure 3(b) are identified by reference
numerals 110-114, respectively. In branching blocks
102-104, 110, 111 and 113, the left hand branch is
35 denoted by the suffix "a" and the right hand branch is
denoted by the suffix "b". Blocks 100 and 110-114
describe actions occurring in the MCP environment. Blocks