



```

PPPPPPPP      000000      SSSSSSSS      FFFFFFFFFF      IIIIII      DDDDDDDD
PPPPPPPP      000000      SSSSSSSS      FFFFFFFFFF      IIIIII      DDDDDDDD
PP      PP      00      00      SS      FF      II      DD      DD
PP      PP      00      00      SS      FF      II      DD      DD
PP      PP      00      00      SS      FF      II      DD      DD
PP      PP      00      00      SS      FF      II      DD      DD
PPPPPPPP      00      00      SSSSSS      FFFFFFFF      II      DD      DD
PPPPPPPP      00      00      SSSSSS      FFFFFFFF      II      DD      DD
PP      00      00      SS      FF      II      DD      DD
PP      00      00      SS      FF      II      DD      DD
PP      00      00      SS      FF      II      DD      DD
PP      00      00      SS      FF      II      DD      DD
PP      00      00      SS      FF      II      DD      DD
PP      000000      SSSSSSSS      FFFFFFFF      IIIIII      DDDDDDDD
PP      000000      SSSSSSSS      FFFFFFFF      IIIIII      DDDDDDDD

```

```

LL      IIIIII      SSSSSSSS
LL      IIIIII      SSSSSSSS
LL      II      SS
LL      II      SS
LL      II      SS
LL      II      SS
LL      II      SSSSSS
LL      II      SSSSSS
LL      II      SS
LL      II      SS
LL      II      SS
LL      II      SS
LLLLLLLLLL      IIIIII      SSSSSSSS
LLLLLLLLLL      IIIIII      SSSSSSSS

```



```

1 0001 0 MODULE POSFID ( LANGUAGE ( BLISS32 ) ,
2 0002 0 IDENT = 'V04-000'
3 0003 0 ) =
4 0004 1 BEGIN
5 0005 1
6 0006 1 *****
7 0007 1 *
8 0008 1 * COPYRIGHT (c) 1978, 1980, 1982, 1984 BY *
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25 0025 1 *
26 0026 1 *
27 0027 1 *****
28 0028 1
29 0029 1 ++
30 0030 1
31 0031 1 FACILITY: MTAACP
32 0032 1
33 0033 1 ABSTRACT:
34 0034 1 This module position the tape
35 0035 1
36 0036 1 ENVIRONMENT:
37 0037 1
38 0038 1 VMS operating system, including privileged system services
39 0039 1 and internal exec routines.
40 0040 1
41 0041 1 --
42 0042 1
43 0043 1
44 0044 1
45 0045 1 AUTHOR: D. H. GILLESPIE, CREATION DATE: 31-MAY-77 11:30
46 0046 1
47 0047 1 MODIFIED BY:
48 0048 1
49 0049 1 V03-001 ROW0258 Ralph O. Weber 21-NOV-1983
50 0050 1 The Paul Painter Memorial Enhancement
51 0051 1 Named for one of the unfortunate customers who suffered much
52 0052 1 to determine the great UCBSL_MT_RECORD secret while trying to
53 0053 1 create a user-written magtape driver, this change eliminates
54 0054 1 use of the device dependent field, UCBSL_MT_RECORD in favor of
55 0055 1 the device independent field, UCBSL_RECORD.
56 0056 1
57 0057 1 V02-005 DMW00079 David Michael Walp 2-Mar-1982

```

POSFID  
V04-000

F 4  
16-Sep-1984 02:28:57  
14-Sep-1984 12:46:47

VAX-11 Bliss-32 V4.0-742  
[MTAACP.SRC]POSFID.B32;1

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(1)

```
.. 58          0058 1 |      Added check for RVN greater then byte size
.. 59          0059 1 |
.. 60          0060 1 |      V02-004 REFORMAT      Maria del C. Nasr      30-Jun-1980
.. 61          0061 1 |
.. 62          0062 1 |
.. 63          0063 1 |      !**
.. 64          0064 1 |
.. 65          0065 1 |      LIBRARY 'SYSS$LIBRARY:LIB.L32';
.. 66          0066 1 |
.. 67          0067 1 |      REQUIRE 'SRCS:MTADEF.B32';
```

RD/ VO/

..

00  
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50  
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07  
00  
02  
00  
06  
00  
04  
00

```

: 69      0451 1 GLOBAL ROUTINE POSITION_BY_FID ( FID WANTED, RVN WANTED ) :
: 70      0452 1                                     COMMON_CALL NOVXALUE =
: 71      0453 1
: 72      0454 1 ++
: 73      0455 1
: 74      0456 1 FUNCTIONAL DESCRIPTION:
: 75      0457 1     This routine positions the tape just passed the headers of the file
: 76      0458 1     specified by FID
: 77      0459 1
: 78      0460 1 CALLING SEQUENCE:
: 79      0461 1     POSITION_BY_FID ( ARG1, ARG2 )
: 80      0462 1
: 81      0463 1 INPUT PARAMETERS:
: 82      0464 1     ARG1 - file identifier
: 83      0465 1     ARG2 - rvn on which file resides
: 84      0466 1
: 85      0467 1 IMPLICIT INPUTS:
: 86      0468 1     CURRENT_VCB - address of current vcb
: 87      0469 1     CURRENT_UCB - address of current unit control block
: 88      0470 1
: 89      0471 1 OUTPUT PARAMETERS:
: 90      0472 1     NONE
: 91      0473 1
: 92      0474 1 IMPLICIT OUTPUTS:
: 93      0475 1     NONE
: 94      0476 1
: 95      0477 1 ROUTINE VALUE:
: 96      0478 1     NONE
: 97      0479 1
: 98      0480 1 SIDE EFFECTS:
: 99      0481 1     tape positioned passed HDR1 and HDR2 (if it exists)
: 100     0482 1     these labels are read in
: 101     0483 1     if file doesn't exist, error exit taken
: 102     0484 1
: 103     0485 1 USER ERRORS:
: 104     0486 1     SS$_NOSUCHFILE - no file exists that matches fid
: 105     0487 1 --
: 106     0488 1
: 107     0489 1 BEGIN
: 108     0490 1
: 109     0491 1 EXTERNAL REGISTER
: 110     0492 1     COMMON_REG;
: 111     0493 1
: 112     0494 1 EXTERNAL
: 113     0495 1     CURRENT_UCB      : REF BBLOCK,      ! address of current UCB
: 114     0496 1     HDR1              : REF BBLOCK;      ! address of HDR1 (EOF1) label
: 115     0497 1
: 116     0498 1 EXTERNAL ROUTINE
: 117     0499 1     READ_HDR,          ! read headers
: 118     0500 1     MOUNT_VOL,        ! mount relative volume
: 119     0501 1     SPACE_EOF;       ! space to end of file
: 120     0502 1
: 121     0503 1 BIND
: 122     0504 1     CUR_FID = CURRENT_VCB[VCB$W_CUR_NUM];
: 123     0505 1
: 124     0506 1 LOCAL
: 125     0507 1     TM;                ! number of tm's past in file

```

: 126 0508  
: 127 0509  
: 128 0510  
: 129 0511  
: 130 0512  
: 131 0513  
: 132 0514  
: 133 0515  
: 134 0516  
: 135 0517  
: 136 0518  
: 137 0519  
: 138 0520  
: 139 0521  
: 140 0522  
: 141 0523  
: 142 0524  
: 143 0525  
: 144 0526  
: 145 0527  
: 146 0528  
: 147 0529  
: 148 0530  
: 149 0531  
: 150 0532  
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: 152 0534  
: 153 0535  
: 154 0536  
: 155 0537  
: 156 0538  
: 157 0539  
: 158 0540  
: 159 0541

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0  
1

```
! if the file id is zero, then the user has input an invalid file id or  
! the acp has a bug.  
IF ( .FID_WANTED EQL 0 ) THEN ERR_EXIT ( SSS_BADPARAM );  
IF ( .CUR_FID EQLU .FID_WANTED )  
  AND ( ( .CURRENT_VCB[VCBSB_TM] EQLU 0 )  
    OR ( ( .CURRENT_VCB[VCBSB_TM] EQLU 1 )  
      AND ( ( .CURRENT_VCB[VCBSB_ST_RECORD] -  
        CURRENT_UCB[UCBSL_RECORD] ) EQLU 0 )  
      AND ( .HDR1[HDR1SL_HDR1LID] EQL 'HDR1' )  
    ) )  
  THEN RETURN;  
! check if RVN is less then byte size  
IF ( .RVN_WANTED GEQU 256 ) THEN ERR_EXIT ( SSS_BADPARAM );  
MOUNT_VOL ( IF ( .RVN_WANTED EQL 0 ) THEN 1 ELSE .RVN_WANTED,  
  $FIELDMASK ( MOUSV_LBLCHECK ) OR $FIELDMASK ( MOUSV_REWIND )  
);  
READ_HDR();  
WHILE TRUE DO  
  BEGIN  
    IF ( .CUR_FID EQLU .FID_WANTED ) THEN EXITLOOP;  
    SPACE_EOF();  
    IF NOT READ_HDR() THEN ERR_EXIT ( SSS_NOSUCHFILE );  
  END;  
END;  
! end of routine
```

```
.TITLE POSFID  
.IDENT \V04-000\  
  
.EXTRN CURRENT_UCB, HDR1  
.EXTRN READ_HDR, MOUNT_VOL  
.EXTRN SPACE_EOF  
  
.PSECT $CODE$,NOWRT,2  
  
.ENTRY POSITION_BY_FID, Save nothing  
TSTL FID_WANTED  
BNEQ 1$  
CHMU #20  
CMPL 36(CURRENT_VCB), FID_WANTED  
BNEQ 2$  
TSTB 46(CURRENT_VCB)  
BEQL 7$  
CMPB 46(CURRENT_VCB), #1  
BNEQ 2$  
MOVL CURRENT_UCB, R0  
CMPL 48(CURRENT_VCB), 176(R0)
```

```
04 AC 04 AC 04 AC 04 AC 04 AC 04 AC 04 AC 04 AC  
0000 0000  
0002 0005  
0007 0009 1$:  
0010 0013  
0015 0019  
001B 0020
```

```
: 0451  
: 0512  
: 0514  
: 0515  
: 0516  
: 0518  
:
```

31524448	8F	0000G	0B 12 00026	BNEQ	2\$			
			DF D1 00028	CMPL	@HDR1, #827475016			: 0519
00000100	8F	08	3E 13 00031	BEQL	7\$			: 0526
			AC D1 00033	CMPL	RVN_WANTED, #256			: 0529
			02 1F 0003B	BLSSU	3\$			: 0528
			14 BF 0003D	CHMU	#20			
		08	03 DD 0003F	PUSHL	#3			
			AC D5 00041	TSTL	RVN_WANTED			
			04 12 00044	BNEQ	4\$			
			01 DD 00046	PUSHL	#1			
		08	03 11 00048	BRB	5\$			
0000G	CF		AC DD 0004A	PUSHL	RVN_WANTED			
0000G	CF		02 FB 0004D	CALLS	#2, MOUNT VOL			
04	AC	24	00 FB 00052	CALLS	#0, READ_HDR			: 0532
			AB D1 00057	CMPL	36(CURRENT_VCB), FID_WANTED			: 0536
			13 13 0005C	BEQL	7\$			
0000G	CF		00 FB 0005E	CALLS	#0, SPACE_EOF			: 0537
0000G	CF		00 FB 00063	CALLS	#0, READ_HDR			: 0538
	EC		50 E8 00068	BLBS	RO, 6\$			
		0910	8F BF 0006B	CHMU	#2320			
			E6 11 0006F	BRB	6\$			: 0534
			04 00071	RET				: 0541

: Routine Size: 114 bytes, Routine Base: \$CODE\$ + 0000

: 160	0542	1
: 161	0543	1 END
: 162	0544	1
: 163	0545	0 ELUDOM

PSECT SUMMARY

Name	Bytes	Attributes
\$CODE\$	114	NOVEC, NOWRT, RD, EXE, NOSHR, LCL, REL, CON, NOPIC, ALIGN(2)

Library Statistics

File	Total	Symbols Loaded	Percent	Pages Mapped	Processing Time
_\$255\$DUA28:[SYSLIB]LIB.L32;1	18619	12	0	1000	00:01.9

COMMAND QUALIFIERS

: BLISS/CHECK=(FIELD,INITIAL,OPTIMIZE)/LIS=LIS\$:POSFID/OBJ=OBJ\$:POSFID MSRC\$:POSFID/UPDATE=(ENH\$:POSFID)

: Size: 114 code + 0 data bytes  
: Run Time: 00:06.9  
: Elapsed Time: 00:15.1  
: Lines/CPU Min: 4759  
: Lexemes/CPU-Min: 20288  
: Memory Used: 86 pages  
: Compilation Complete



WTATTR LIS

POSFID LIS

RESACC LIS

RWVOL LIS

MTHRTL

STRVIO LIS

MTHRTL MAP

POSBE LIS

RDATTR LIS

REWSPC LIS

UUMTHRTL MAP