

FP24 SYSTEM TEST SUPERVISOR

```

ERR LOC OBJECT CODE      ADDR STMT SOURCE STATEMENT
      2          D'CK 1
0A00 3 FF2      S'ART X'A00'
      4 *****
      5 *
      6 *          SYSTEM/3 SYSTEM TEST SUPERVISOR
      7 *
      8 *****
0A00 FF24      0A01 9          DC  XL2'FF24'          PROGRAM IDENTIFICATION AND LEVEL
0A02 8C        0A02 10         DC  XL1'80'          FLAGS - NO SPUdT
0A03 00        0A03 11         DC  IL1'0'          CURRENT ROUTINE NUMBER
0A04 0000      0A05 12         DC  XL2'0'          RESERVED
0A06 0A91      0A07 13         DC  AL2(R'NO1)        ADDRESS OF FIRST ROUTINE PREFIX
0A08 0000      0A09 14         DC  XL2'0'          RESERVED
      15
      16 *****
      17 *
      18 *          TRANSFER TABLE
      19 *
      20 *  THE SYSTEMS TEST SUPERVISOR PROVIDE; THE FOLLOWING LINKAGE
      21 *  FOR USE BY THE MODULES IT CONTROLS.  EACH MODULE MUST BE WRITTEN
      22 *  TO BRANCH TO THIS ENTRY WHENEVER THE DEVICE BEING TESTED IS BUSY
      23 *  OR NOT READY.
      24 *****
0A0A 35 10 0A0F 25          L    TR1,IAR          ENTRY TO PASS CONTROL TO NEXT MODULE
0A0E 0AB2      0A0F 27 TR1    DC  AL2(RENTRY)
      28
0A10 0A10      0A10 29 TABLE EQU *          TABLE CONTAINING CATALOG OF PROGRAM
0A90 0A90      0A90 30          DS  CL129          MODULES IN CORE.  PROVISIONS ARE
      31 *          MADE FOR SUPERVISION OF UP TO 16
      32 *          MODULES.  INFORMATION IS CONTAINED*
      33 *          AS IN THE FOLLOWING DIAGRAM.
      34 *
      35 *          *****
      36 *          *  ARR    I  XR1    I  XR2    I STARTING *
      37 *          *          I          I          I ADDRESS *
      38 *****
      39
      40 *****
      41 *          ROUTINE 01 - SYSTEMS TEST SUPERVISOR
      42 *****
      43 *
      44 *  THIS ROUTINE PROVIDES THE SUPERVISORY FUNCTION TO HANDLE THE
      45 *  SIMULTANEOUS OPERATION OF UP TO 16 PROGRAM MODULES.  THE INDI-
      46 *  VIDUAL MODULES ARE REFERENCED BY 8-... ENTRIES IN -TABLE-.
      47 *  LINKAGE FROM MODULE TO SUPERVISOR MUST TAKE PLACE EACH TIME THE
      48 *  DEVICE BEING TESTED IS BUSY OR NOT READY.  TRANSFER MUST BE MADE
      49 *  VIA A BRANCH TO LOCATION X'A0A'.  THE SUPERVISOR SAVES THE PRO-
      50 *  GRAM ARR, XR1 AND XR2, THEN PASSES CONTROL TO THE NEXT PROGRAM
      51 *  BY BRANCHING VIA ITS PREVIOUSLY STORED AR.
      52 *****
0A91 01        0A91 53 RTN01 DC  XL1'01'          CURRENT ROUTINE NUMBER
0A92 00        0A92 54          DC  XL1'0'          FLAGS
0A93 0B5A      0A94 55          DC  AL2(RTN02)        ADDRESS OF NEXT ROUTINE PREFIX
      56 *****
0A95 C2 01 0A10 57          LA  TABLE,XR1          SET UP TO RESTART ALL MODULES
0A99 7D FF C0 58 R1LCOP CLI 0(,XR1),X'PF'
0A9C F2 81 9C 59          JE  FIRST
0A9F 75 02 C7 60          L   7(,XR1),XR2
0AA2 6C 01 01 07 61          MVC 1(2,XR1),7(,XR2)
0AA6 4E 01 01 0C44 62          ALC 1(2,XR1),FOUR
0AAB D2 01 08 63          LA  8(,XR1),XR1
0AAE C0 87 CA99 64          B   R1LOOP
      65 *****
      66 *          MODULE LINKAGE TO THIS SUPERVISORY ROUTINE IS MADE AS FOLLOWS
      67 *
      68 *          B          ENTRY          WHERE          ENTRY EQU  X'A0A'
      69 *****

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FF24 SYSTEM TEST SUPERVISOR

ERR LOC	OBJECT CODE	ADDR	STMT	SOURCE STATEMENT	
0AB2	34 01 CC92	70	REENTRY	ST SAVE1, XR1	SAVE XR1 TEMPORARILY
0AB6	35 01 CC96	71	L	PCINTR, XR1	RELOAD TABLE POINTER
0ABA	74 08 01	72	ST	1(, XR1), ARR	PLACE RETURN ADDRESS IN TABLE SLOT
0ABD	4C 01 C3 0C92	73	MVC	3(2, XR1), SAVE1	SAVE MODULE XR1 AND XR2
0AC2	74 02 C5	74	ST	5(, XR1), XR2	
0AC5	30 00 0C92	75	CKLOG	SNS SAVE1, X'0'	CHECK DATA SWITCHES FOR LOGOUT
0AC9	3D EB 0C91	76	CLI	SAVE1-1, X'BB'	INSTRUCTIONS
0ACD	C0 81 0216	77	BE	LINK	
0AD1	38 A0 0C91	78	TBN	SAVE1-1, X'A0'	CONTINUE TEST IF NOT 'A' OR 'B'
0AD5	39 40 0C91	79	TBF	SAVE1-1, X'40'	IN DATA SWITCHES
0AD9	F2 90 43	80	JF	CKDCP	
0ADC	08 01 0C93 0C91	81	MZN	WORK-1, SAVE1-1	ISOLATE ID OF MODULE TO BE ENABLED
0AE2	08 02 0C93 0C92	82	MNZ	WORK-1, SAVE1	OR DISABLED
0AEB	08 01 0C94 0C92	83	MZN	WORK, SAVE1	
0AEE	C2 01 0A08	84	LA	TABLE-8, XR1	GO THROUGH TABLE OF MODULES UNTIL
0AF2	D2 01 C8	85	FINDLP	8(, XR1), XR1	CORRECT ONE FOUND
0AF5	7D FF 00	86	CLI	0(, XR1), X'FF'	
0AF8	F2 81 24	87	JE	CKDCP	
0AFB	75 02 C7	88	L	7(, XR1), XR2	
0AFE	28 03 0C94 01	89	MNN	WORK, 1(, XR2)	
0B03	2D 01 0C94 01	90	CLC	WORK(2), 1(, XR2)	
0B08	C0 01 0AF2	91	BNE	FINDLP	
0B0C	7C EE 00	92	MVI	0(, XR1), X'EE'	DISABLE MODULE IF ENTRY WAS AXXX
0B0F	38 10 0C91	93	TBN	SAVE1-1, X'10'	ENABLE IF BXXX
0B13	F2 90 C9	94	JF	CKDCP	
0B16	6C 01 C1 07	95	MVC	1(2, XR1), 7(, XR2)	
0B1A	4E 01 0' 0C44	96	ALC	1(2, XR1), FOUR	
0B1F	35 01 0C96	97	CKDCP	L PCINTR, XR1	RELOAD TABLE POINTER
0B23	3D D0 0C91	98	CLI	SAVE1-1, X'D0'	GO TO DCP IF POSSIBLE VALID ENTRY
0B27	C0 C2 C212	99	BNL	TEST	
0B2B	D2 C1 C8	100	NEXT	8(, XR1), XR1	INCREMENT POINTER TO NEXT TABLE SLOT
0B2E	7D EE C0	101	CLI	0(, XR1), X'EE'	SKIP MODULE IF IT IS DISABLED
0B31	C0 81 0B2B	102	BE	NEXT	
0B35	7D FF 00	103	CLI	0(, XR1), X'FF'	BRANCH IF NOT LAST ENTRY
0B38	F2 C1 0C	104	JNE	GOTO	
0B3B	C2 01 0A08	105	FIRST	LA TABLE-8, XR1	RE-INITIALIZE TABLE POINTER IF THIS
0B3F	34 01 CC96	106	ST	PCINTR, XR1	WAS LAST ENTRY
0B43	C0 37 0AC5	107	B	CKLOG	
0B47	1C 01 0B59 01	108	GOTO	MVC RETURN+3(2), 1(, XR1)	LOAD RETURN ADDRESS WITH SAVED ARR
0B4C	75 02 05	109	L	5(, XR1), XR2	RESTORE XR1 AND XR2 FOR THIS PROGRAM
0B4F	34 C1 0C96	110	ST	PCINTR, XR1	MODULE & SAVE TABLE POINTER
0B53	75 01 03	111	L	3(, XR1), XR1	
0B56	C0 87 0000	112	RETURN	B *-*	GO TO NEW PROGRAM MODULE
		113			
		114		*****	
		115	*	ROUTINE 2 - LOGOUT	*
		116		*****	
		117	*		*
		118	*	THIS ROUTINE LOGS THE ERROR RECORDING TABLE FROM EACH MODULE.	*
		119	*	LOGOUT OCCURS ONLY UPON DATA SWITCH SELECTION OF THIS ROUTINE.	*
		120	*	RECORDING TABLE ENTRIES HAVE THE FOLLOWING FORMAT	*
		121	*		*
		122	*	*****	*
		123	*	* CODE * LENGTH * N BYTES OF FORMAT SPECIFIED *	*
		124	*	* BYTE * -N- * BY THE CODE BYTE *	*
		125	*	*****	*
		126	*	*	*
		127	*	*	*
		128	*	*	*
		129	*	BIT 0 - PRINTABLE DATA - PRINT AS IS.	*
		130	*	1 - PACKED HEX DATA - UNPACK BEFORE PRINTING.	*
		131	*		*
		132	*	A CODE BYTE OF X'FF' TERMINATES LOGOUT.	*
		133		*****	
0B5A	02	0B5A	134	RIN02 DC XL1'02'	CURRENT ROUTINE NUMBER
0B5B	00	0B5B	135	DC XL1'0'	FLAGS
0B5C	FFFF	0B5D	136	DC XL2'FFFF'	LAST ROUTINE PREFIX
			137	*****	

FP24 SYSTEM TEST SUPERVISOR

ERR	LOC	OBJECT	CODE	ADDR	STMT	SOURCE	STATEMENT
0E5E	CC	87	021A		138	B	PRINT SPACE PRINTER
0E62	13			0E62	139	DC	XL1'13'
0E63	3C	5C	08DA		140	MVI	PLINE+90,C'*
0E67	0C	59	08D9	08DA	141	MVC	PLINE+89(90),PLINE+90
0E6D	CC	87	021A		142	B	PRINT SEPARATION
0E71	22			0E71	143	DC	XL1'22'
0E72	C2	01	0A10		144	LA	TABLE,XR1
0E76	7D	FF	00		145	CKMOD	CLI 0(,XR1),X'FF'
0E79	F2	81	A2		146	JE	LOGEND
0E7C	7C	02	C7		147	L	7(,XR1),XR2
0E7F	BD	FF	08		148	CLI	8(,XR2),X'FF'
0E82	F2	81	92		149	JE	NXMOD1
0E85	E5	02	C9		150	L	9(,XR2),XR2
0E88	B9	3F	00		151	LOOPS	TBF 0(,XR2),B'00111111'
0E8B	F2	90	75		152	JF	NXMOD
					153	*	IF X'FF' CODE BYTE - MODULE DONE
0E8E	2C	00	0C48	01	154	MVC	ADR(1),1(,XR2)
0E93	3C	00	0C47		155	MVI	ADR-1,X'0'
0E97	2C	00	0BF5	01	156	MVC	PLEN(1),1(,XR2)
0E9C	34	C2	0BF7		157	ST	PADR,XR2
0EAD	0E	01	0BF7	0C42	158	ALC	PADR(2),ONE
0BA6	0E	01	0BF7	0C48	159	ALC	PADR(2),ADR
0BAC	0C	01	0BE5	0BF7	160	MVC	UADR1(2),PADR
0BB2	B8	80	00		161	TBN	0(,XR2),X'80'
0BB5	F2	10	38		162	JT	PRTEXT
0BB8	B8	40	00		163	TBN	0(,XR2),X'40'
0BBB	F2	90	45		164	JF	NXMOD
0EE4	2C	00	0BE3	01	165	MVC	ULEN(1),1(,XR2)
0EC3	0C	01	0BE7	0C46	166	MVC	UADR2(2),X881
0EC9	0E	00	0C48	0C48	167	ALC	ADR(1),ADR
0ECF	0E	01	0BE7	0C48	168	ALC	UADR2(2),ADR
0BD5	3C	40	08FF		169	MVI	PLINE+127,C' '
0BD9	0C	83	08FE	08FF	170	AVC	PLINE+126(132),PLINE+127
0BDF	C0	87	021E		171	B	UNPACK
0BE3	00			0BE3	172	DC	IL1'0'
0BE4	0000			0BE5	173	UADR1	DC AL2(*-*)
0BE6	0000			0BE7	174	UADR2	DC AL2(*-*)
0EE8	C0	87	021A		175	B	PRINT
0BEC	21			0DEC	176	DC	XL1'21'
0BED	F2	87	08		177	J	NXCODE
0BF0	C0	87	021A		178	PRTEXT	B PRINT
0BF4	01			0BF4	179	DC	IL1'01'
0BF5	00			0BF5	180	PLEN	DC IL1'0'
0BF6	0000			0BF7	181	PADR	DC AL2(*-*)
0BF8	35	02	0BE5		182	NXCODE	I UADR1,XR2
0BFC	E2	02	01		183	LA	1(,XR2),XR2
0BFF	C0	87	0B88		184	B	LOOPS
0C03	C0	87	021A		185	NXMOD	B PRINT
0C07	11			0C07	186	DC	XL1'11'
0C08	3C	60	08DA		187	MVI	PLINE+90,C'-'
0C0C	0C	59	08D9	08DA	188	MVC	PLINE+89(90),PLINE+90
0C12	C0	87	021A		189	B	PRINT
0C16	22			0C16	190	DC	XL1'22'
0C17	D2	01	08		191	NXMOD1	LA 8(,XR1),XR1
0C1A	C0	87	0B76		192	B	CKMOD
0C1E	C0	87	021A		193	LOGEND	B PRINT
0C22	42			0C22	194	DC	XL1'42'
0C23	48			0C23	195	DC	IL1'72'
0C24	0C90			0C25	196	DC	AL2(ENDMSG)
0C26	FFE1			0C27	197	DC	XL2'FFE1'
0C28	3C	5C	08DA		198	MVI	PLINE+90,C'*
0C2C	0C	59	08D9	08DA	199	MVC	PLINE+89(90),PLINE+90
0C32	C0	87	021A		200	B	PRINT
0C36	26			0C36	201	DC	XL1'26'
0C37	C0	87	0222		202	B	HALT
0C3B	FFE1			0C3C	203	DC	XL2'FFE1'
0C3D	C0	87	0000		204	B	0
					205		GO RESTART PROGRAM

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ERR LOC	OBJECT CODE	ADDR	STMT	SOURCE STATEMENT
			206	*****
			207	* CONSTANTS *****
			208	*****
0C41	0001	0C42	209	ONE DC IL2'1'
0C43	0004	0C44	210	FOUR DC IL2'4'
0C45	0881	0C46	211	X881 DC XL2'881'
0C47	00C0	0C48	212	ADR DC XL2'0'
			213	
			214	*****
			215	* PRINTOUTS *****
			216	*****
0C49	D3E6C7D6E4E340C3	0C7B	217	DC CL51'LOGOUT COMPLETE - REMOVE -BB- FROM LEFT 2 SWS THEN '
0C51	D6D4D7E3C5E3C540		217	
0C59	6040E9C5D4D6E5C5		217	
0C61	40E0C2C26040C6D9		217	
0C69	D6E440D3C5C6E340		217	
0C71	F240E2E6F240E3C8		217	
0C79	C5D540		217	
0C7C	F9C5E2C5E340C8C1	0C90	218	ENDMSG DC CL21'RESET HALT TO RESTART'
0C84	D3E340E3D640D9C5		218	
0C8C	E2E3C1D9E3		218	
			219	
			220	*****
			221	* RESERVED STORAGE *****
			222	*****
0C91		0C92	223	SAVE1 DS CL2 TEMPORARY SAVE AREA FOR XR1
0C93		0C94	224	WORK DS CL2
0C95		0C96	225	POINTR DS CL2 TABLE POINTER FOR NEXT MODULE
			226	
			227	*****
			228	* EQUATES *****
			229	*****
0001	231	XI1	EQU	1 INDEX REGISTER 1
0002	231	XI2	EQU	2 INDEX REGISTER 2
0008	232	ARR	EQU	X'08' ADDRESS RECALL REGISTER
0010	233	IAR	EQU	X'10' INSTRUCTION ADDRESS REGISTER
0212	234	TEST	EQU	X'212' SRT -ENTRY TO CHECK CONSOLE SWITCHES
0216	235	LINK	EQU	X'216' SRT -ENTRY TO CHAIN ROUTINE
021A	236	PRINT	EQU	X'21A' SRT -ENTRY TO PRINT
021E	237	UNPACK	EQU	X'21E' SRT -ENTRY TO CONVERT HEX TO EBCDIC
0222	238	HALT	EQU	X'222' SRT -ENTRY TO HALT
0880	239	PLINE	EQU	X'880' START OF DCP PRINT LINE
			240	TREP
			241	TREP
			242	TREP
			243	TREP
			244	TREP
			245	TREP
			246	TREP
FFFF			247	END

PF24 SYSTEM TEST SUPERVISOR

CROSS-REFERENCE

SYMBOL	T	LEN	VALUE	DEFN	REFERENCES
ADR	A	002	0048	0212	0154* 0155* 0159 0167 0167* 0168
ARR	C	001	0008	0232	0072
CKDCP	A	004	0B1F	0097	0080 0087 0094
CKLCG	A	004	0AC5	0075	0107
CKMOD	A	003	0B76	0145	0192
ENDMSG	A	021	0C90	0218	0196
FF2	A	001	0A00	0003	
FINDLP	A	003	0AF2	0085	0091
FIRST	A	004	0B3F	0105	0059
FOUR	A	002	0C44	0210	0062 0096
GOTO	A	005	0B47	0100	0104
HALT	C	001	0222	0238	0202
IAR	C	001	0010	0233	0025*
LINK	C	001	0216	0235	0077
LOGEND	A	004	0C1E	0193	0146
LCCPS	A	003	0B55	0151	0184
NEXT	A	003	0B25	0100	0102
NXCODE	A	004	0BF8	0182	0177
NXMOD	A	004	0C03	0185	0152 0164
NXMCD1	A	003	0C17	0191	0149
ONE	A	002	0C42	0209	0158
PADR	A	002	0BF7	0181	0157* 0158* 0159* 0160
PLEN	A	001	0BF5	0180	0156*
PLINE	C	001	0B80	0239	0140* 0141 0141* 0169* 0170 0170* 0187* 0188 0188* 0198* 0199 0199*
POINTR	A	002	0C9F	0225	0071 0097 0106* 0110*
PRINT	C	001	021A	0236	0138 0142 0175 0178 0185 0189 0193 0200
PRTEXT	A	004	0BF0	0178	0162
RETRY	A	004	0AB2	0070	0027
RETURN	A	004	0B56	0112	0108*
RTN01	A	001	0A91	0053	0013
RTN02	A	001	0B5A	0134	0055
R1LOOP	A	003	0A99	0058	0064
SAVE1	A	002	0C92	0223	0070* 0073 0075* 0076 0078 0079 0081 0082 0083 0093 0098
TABLE	A	001	0A10	0029	0057 0084 0105 0144
TEST	C	001	0212	0234	0092
TR1	A	002	0A0F	0027	0025
UADR1	A	002	0BE5	0173	0160* 0182
UADR2	A	002	0BE7	0174	0166* 0168*
ULEN	A	001	0BF3	0172	0165*
UNPACK	C	001	021E	0237	0171
WORK	A	002	0C94	0224	0081* 0082* 0083* 0089* 0090
XR1	C	001	0001	0230	0057* 0058 0060 0061 0062 0063 0063* 0070 0071* 0072 0073 0074 0084* 0085 0085* 0086 0088 0092 0095 0096 0097* 0100 0100* 0101 0103 0105* 0106 0108 0109 0110 0111 0111* 0144* 0145 0147 0191 0191*
XR2	C	001	0002	0231	0060* 0061 0074 0088* 0089 0090 0095 0109* 0147* 0148 0150 0150* 0151 0154 0156 0157 0161 0163 0165 0182* 0183 0183*
X881	A	002	0C46	0211	0166

TOTAL STATEMENTS FLAGGED IN THIS MBL Y = 0

PF24 SYSTEM TEST SUPERVISOR

OBJECT CARD LISTING

THE CHARACTER ' INDICATES A BLANK COLUMN AND THE CHARACTERS D E H INDICATE NUMERIC SHIFT.

CL 1 THROUGH 16 CL 17 THROUGH 32 CL 33 THROUGH 48 CL 49 THROUGH 64 CL 65 THROUGH 80 CL 81 THROUGH 96

TCOY|"2K BZD CM&B-@H%- ..... C04G7QHFF240001

T<0,D & .OAHAE/A "OC2-R15 -) % &D GL-DACDLK &T /OD R( 'D<UTMACIR4B E < &<<UX&BA& OHBE -F&\*C1\$QFF240002

T.0,4< <UT6#CIG -&HG+H <ULV CIG 2UD<H &2LCIDH -2 LCIHH &2MCI.B &Y H4-DH BOYISH-GAY LC0\*C#H&FF240003

T<0%Y--@ @YDU) &H GH <<V D\_ &2M \* AB?I@#- 8D 2J@Z I\$ DAA48A &1D(&D <VT7&CIG - 1.KU )E/D<-IDFF240004

T( \_ ) / .K & / ' \* -C - &% , --@ @-T<0-D HBC&ACIS /0, EG D .0&E5 -M4 &2O) &D COH\* H " " @ HKD ) FJM.RLHFF240005

T(->M0H\*BF/<@P T ECEUH6&TE0H\*BFS. B &YE--@ @YFS) &H G?-@H@YFK\_&HI>L& @ZA5. <<K D@ C<PP- FF240006

T.0?DCD\*% ?5 I& BB"\*+ &?7CDH+ &? 7CD-< &?VB";B- C 2DCS8& C2UDM% ? T &0A %GAYOEA +B-MAOTDFF240007

T( ?9B=\*<J-@ CD- <K @AB=\*<KCI B|@ <-OT=B|" /OH; C /OH&H-HGB<B G /YA ( &H C04 IA0<A:Q4FF240008

T(-00B=PS -G /O> H0H\*BF/D@Q TECEU H&ET&0H\*BFS.K &T /O\_&0H\*BFULHCIC "8L1\*b(Y<O&TRB ,H0-AEH4FF240009

T+-1,6&BG /YWOH\* BH?" /OH\* A & H-& 4\*\$G5>LTE<| 05 (-L1;|E&PA 6\*P M5>PE&FCBOWA 1\_X 05D 'H\*FF240010

TI 2&4@PF84C2&+. WBUCT2<PNE(XE8%P TE<TA4=( 8'R 6\*P S8&GR80 \$- FF240011

\*\*\*\*\* EL FF240012

\* PF2 - SYSTEM TEST SUPERVISOR. \*;ZQFF240013

\* ROUTINE \*5&FF240014

\* 01 - MODULE MULTI-PROGRAMMING SUPERVISOR. \*JS<FF240015

\* 02 - LOGOUT ROUTINE. SET LEFT ADDRESS SWITCHES TO -BB- TO OBTAIN LOGOUT. \*'.QFF240016

\* AFTER LOGOUT REMOVE -BB- FROM LEFT 2 SWITCHES. \*-L4FF240017

\*\*\*\*\* ELYFF240018

E""\*E7\*=-DC"PH\$ =7H&F| ! C F% ASC R A S0 Q 09310317710 40571=HDF240019

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