

fig-FORTH 6502

ASSEMBLY SOURCE LISTING

RELEASE 1.1

WITH COMPILER SECURITY

AND

VARIABLE LENGTH NAMES

September 1980

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FORTH INTEREST GROUP P.O. Box 1105 San Carlos, Ca. 94070

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LINE #	LOC	CODE	LINE
0002	0000	;	
0003	0000	;	Through the courtesy of
0004	0000	;	
0005	0000	;	FORTH INTEREST GROUP
0006	0000	;	P. O. Box 1105
0007	0000	;	San Carlos, CA 94070
0008	0000	;	
0009	0000	;	Release 1.1
0010	0000	;	With compiler security
0011	0000	;	and
0012	0000	;	variable length names
0013	0000	;	
0014	0000	;	Further distribution must include the above notice
0015	0000	;	The FIG Installation Manual is required as it
0016	0000	;	contains the model of FORTH and glossary of the system.
0017	0000	;	Available from FIG at the above address for \$10.00 postpaid
0018	0000	;	
0019	0000	;	Translated from the FIG Model by W. F. Ragsdale
0020	0000	;	with input-output given for the Rockwell System-65.
0021	0000	;	Transportation to other systems only requires
0022	0000	;	alteration of: XEMIT, XKEY, XQTER, XCR, and RSLW.
0023	0000	;	

LINE #	LOC	CODE	LINE
0025	0000		;
0026	0000		; Equates giving memory assignments, machine
0027	0000		; registers, and disk parameters.
0028	0000		;
0029	0000		;
0030	0000	SSIZE =128	sector size in bytes
0031	0000	NBUF =8	; number of buffers desired in ram
0032	0000	;	(SSIZE*NBUF >= 1024 bytes)
0033	0000	SECTR =800	sectors per drive
0034	0000	;	forcing hi drive to Screen #100
0035	0000	SECTL =1600	sector limit for 2 drives
0036	0000	;	of 800 sectors per drive
0037	0000	BMAG =1056	total buffer magnitude, in bytes
0038	0000	;	expressed by SSIZE+4*NBUF
0039	0000	;	;
0040	0000	BOS =\$20	bottom of data stack, in z-page.
0041	0000	TOS =\$9E	top of data stack, in z-page.
0042	0000	N =TOS+8	xXXXXXXXX scratch workspace
0043	0000	IP =N+8	Xx interpretive pointer
0044	0000	W =IP+3	xXx code field pointer
0045	0000	UP =W+2	Xx user area pointer
0046	0000	XSAVE =UP+2	X temporary for X register
0047	0000	;	;
0048	0000	TIBX =\$0100	terminal input buffer of 84 bytes.
0049	0000	ORIG =\$0200	origin of FORTH's dictionary.
0050	0000	MEM =\$4000	top of assigned memory+1 byte.
0051	0000	UAREA =MEM-128	128 bytes of user area
0052	0000	DAREA =UAREA-BMAG	disk buffer area
0053	0000	;	;
0054	0000	;	Monitor calls for terminal support
0055	0000	;	;
0056	0000	OUTCH =\$D2C1	; output one ASCII character to termina
0057	0000	INCH =\$D1DC	; input one ASCII character from termina
0058	0000	TCR =\$D0F1	; terminal return and line feed
0059	0000	;	;
0060	0000	;	;
0061	0000	;	From DAREA downward to the top of the dictionary is free
0062	0000	;	space where the user's applications are compiled.
0063	0000	;	;

LINE #	LOC	CODE	LINE
0065	0000		;
0066	0000		;; Boot up parameters. This area provide jump vectors
0067	0000		to bootup code, and parameters describing the system.
0068	0000		;
0069	0000		*=ORIG
0070	0200	EA	ENTER NOP User cold entry point
0071	0201	4C 47 12	JMP COLD+2 vector to COLD entry
0072	0204	EA	REENTR NOP ; User warm entry point
0073	0205	4C 57 12	JMP WARM vector to WARM entry
0074	0208	04 00	.WORD \$0004 6502 encoded in radix-36
0075	020A	D2 5E	.WORD \$5ED2
0076	020C	64 1A	.WORD NTOP Name address of MON
0077	020E	7F 00	.WORD \$7F Backspace character
0078	0210	80 3F	.WORD UAREA Initial user area
0079	0212	9E 00	.WORD TOS Initial top of stack
0080	0214	FF 01	.WORD \$1FF Initial top of return stack
0081	0216	00 01	.WORD TIBX Initial terminal input buffer
0082	0218	1F 00	.WORD 31 Initial name field width
0083	021A	00 00	.WORD 0 0=no disk 1=disk
0084	021C	74 1A	.WORD TOP Initial fence address
0085	021E	74 1A	.WORD TOP Initial top of dictionary
0086	0220	BE 11	.WORD VL0 Initial vocabulary link pointer
0087	0222		;
0088	0222		;; The following offset adjusts all code fields
0089	0222		to avoid an address ending \$xxFF. This must
0090	0222		be checked and altered on any alteration, for
0091	0222		the indirect jump at W-1 to operate!!!
0092	0222		;
0093	0222		;
0094	0222		**=*+2
0095	0224		;

LINE #	LOC	CODE	LINE
0097	0224	;	
0098	0224	;	LIT
0099	0224	;	
0100	0224	;	SCREEN 13 LINE 1
0101	0224	;	
0102	0224	83	L22 .BYTE \$83,'LI',\$D4 <---- name field
0102	0225	4C 49	
0102	0227	D4	
0103	0228		; <---- link field
0104	0228	00 00	.WORD 00 Last link is marked by zero
0105	022A	2C 02	LIT .WORD *+2 <---- code address field
0106	022C	B1 AE	LDA (IP),Y <---- start of parameter field
0107	022E	48	PHA
0108	022F	E6 AE	INC IP
0109	0231	D0 02	BNE L30
0110	0233	E6 AF	INC IP+1
0111	0235	B1 AE	L30 LDA (IP),Y
0112	0237	E6 AE	L31 INC IP
0113	0239	D0 02	BNE PUSH
0114	023B	E6 AF	INC IP+1
0115	023D		;
0116	023D	CA	PUSH DEX
0117	023E	CA	DEX
0118	023F		;
0119	023F	95 01	PUT STA 1,X
0120	0241	68	PLA
0121	0242	95 00	STA 0,X
0122	0244		;
0123	0244		;
0124	0244		NEXT is the address interpreter that moves from machine level word to word.
0125	0244		;
0126	0244	A0 01	NEXT LDY #1
0127	0246	B1 AE	LDA (IP),Y Fetch code field address pointed
0128	0248	85 B2	STA W+1 to by IP
0129	024A	88	DEY
0130	024B	B1 AE	LDA (IP),Y
0131	024D	85 B1	STA W
0132	024F	20 6F 02	JSR TRACE Remove this when all is well
0133	0252	18	CLC Increment IP by two
0134	0253	A5 AE	LDA IP
0135	0255	69 02	ADC #2
0136	0257	85 AE	STA IP
0137	0259	90 02	BCC L54
0138	025B	E6 AF	INC IP+1
0139	025D	4C B0 00	L54 JMP W-1 Jump to an indirect jump (W) which vectors to code pointed by a code field
0140	0260		;
0141	0260		;
0142	0260		CLIT pushes next inline byte to data stack
0143	0260		;
0144	0260	84	L35 .BYTE \$84,'CLI',\$D4
0144	0261	43 4C 49	
0144	0264	D4	
0145	0265	24 02	CLIT .WORD L22 LINK TO LIT
0146	0267	69 02	.WORD *+2
0147	0269	B1 AE	LDA (IP),Y

LINE #	LOC	CODE	LINE
0148	026B	48	PHA
0149	026C	98	TYA
0150	026D	F0 C8	BEQ L31 a forced branch into LIT
0151	026F	;	
0152	026F	;	This is a temporary trace routine, to be used
0153	026F	;	until FORTH is generally operating. Then NOP
0154	026F	;	the terminal query "JSR ONEKEY". This will allow
0155	026F	;	user input to the text interpreter. When crashes
0156	026F	;	occur, the display shows IP, W, and the word
0157	026F	;	locations of offending code. When all is well,
0158	026F	;	remove: TRACE, TCOLON, PRNAM, DECNP and the
0159	026F	;	following monitor/register equates.
0160	026F	;	
0161	026F	;	
0162	026F	;	Monitor routines needed to trace
0163	026F	;	
0164	026F	XBLANK =\$DOAF	Print one blank
0165	026F	CRLF =\$D0D2	Print a carriage return and line feed
0166	026F	HEX2 =\$D2CE	Print accum as two hex numbers
0167	026F	LETTER =\$D2C1	Print accumulator as one ASCII character
0168	026F	ONEKEY =\$D1DC	Wait for keystroke, into accum.
0169	026F	XW =\$12	Scratch register to next code field address
0170	026F	NP =\$14	Another scratch register pointing to name
0171	026F	;	
0172	026F	86 B5	TRACE STX XSAVE
0173	0271	20 D2 D0	JSR CRLF
0174	0274	A5 AF	LDA IP+1
0175	0276	20 CE D2	JSR HEX2
0176	0279	A5 AE	LDA IP
0177	027B	20 CE D2	JSR HEX2 Print IP, the interpretive pointer
0178	027E	20 AF D0	JSR XBLANK
0179	0281	;	
0180	0281	A0 00	LDY #0
0181	0283	B1 AE	LDA (IP),Y
0182	0285	85 12	STA XW
0183	0287	85 14	STA NP Fetch the next code field pointer
0184	0289	C8	INY
0185	028A	B1 AE	LDA (IP),Y
0186	028C	85 13	STA XW+1
0187	028E	85 15	STA NP+1
0188	0290	20 D9 02	JSR PRNAM Print dictionary name
0189	0293	;	
0190	0293	A5 13	LDA XW+1
0191	0295	20 CE D2	JSR HEX2 Print code field address
0192	0298	A5 12	LDA XW
0193	029A	20 CE D2	JSR HEX2
0194	029D	20 AF D0	JSR XBLANK
0195	02A0	;	
0196	02A0	A5 B5	LDA XSAVE Print stack location in z-page
0197	02A2	20 CE D2	JSR HEX2
0198	02A5	20 AF D0	JSR XBLANK
0199	02A8	;	
0200	02A8	A9 01	LDA #1 Print return stack bottom in Page 1
0201	02AA	20 CE D2	JSR HEX2
0202	02AD	BA	TSX

LINE #	LOC	CODE	LINE
0203	02AE	E8	INX
0204	02AF	8A	TXA
0205	02B0	20 CE D2	JSR HEX2
0206	02B3	20 AF D0	JSR XBLANK
0207	02B6	;	
0208	02B6	20 DC D1	JSR ONEKEY
0209	02B9	A6 B5	LDX XSAVE
0210	02BB	A0 00	LDY #0
0211	02BD	60	RTS
0212	02BE	;	
0213	02BE	;	TCOLON is called from DOCOLON to label each
0214	02BE	;	point where FORTH 'nests' one level.
0215	02BE	;	
0216	02BE	86 B5	TCOLON STX XSAVE
0217	02C0	A5 B1	LDA W
0218	02C2	85 14	STA NP
			Locate the name of the called word.
0219	02C4	A5 B2	LDA W+1
0220	02C6	85 15	STA NP+1
0221	02C8	20 D2 D0	JSR CRLF
0222	02CB	A9 3A	LDA #' :
0223	02CD	20 C1 D2	JSR LETTER
0224	02D0	20 AF D0	JSR XBLANK
0225	02D3	20 D9 02	JSR PRNAM
0226	02D6	A6 B5	LDX XSAVE
0227	02D8	60	RTS
0228	02D9	;	
0229	02D9	;	Print name by its code field address in NP
0230	02D9	;	
0231	02D9	20 FB 02	PRNAM JSR DECNP
0232	02DC	20 FB 02	JSR DECNP
0233	02DF	20 FB 02	JSR DECNP
0234	02E2	A0 00	LDY #0
0235	02E4	20 FB 02	PN1 JSR DECNP
0236	02E7	B1 14	LDA (NP),Y
0237	02E9	10 F9	loop till D7 in name set
0238	02EB	C8	BPL PN1
0239	02EC	B1 14	PN2 INY
0240	02EE	20 C1 D2	LDA (NP),Y
0241	02F1	B1 14	JSR LETTER
0242	02F3	10 F6	LDA (NP),Y
0243	02F5	20 AF D0	BPL PN2
0244	02F8	A0 00	JSR XBLANK
0245	02FA	60	LDY #0
0246	02FB	;	RTS
0247	02FB	;	Decrement name field pointer
0248	02FB	;	
0249	02FB	A5 14	DECNP LDA NP
0250	02FD	D0 02	BNE DECNP1
0251	02FF	C6 15	DEC NP+1
0252	0301	C6 14	DECNP1 DEC NP
0253	0303	60	RTS
0254	0304	;	
0255	0304	;	
0256	0304	0A	SETUP ASL A
0257	0305	85 A5	STA N-1

LINE #	LOC	CODE	LINE	
0258	0307	B5 00	L63	LDA 0,X
0259	0309	99 A6 00		STA N,Y
0260	030C	E8		INX
0261	030D	C8		INY
0262	030E	C4 A5		CPY N-1
0263	0310	D0 F5		BNE L63
0264	0312	A0 00		LDY #0
0265	0314	60		RTS
0266	0315			;
0267	0315			;
0268	0315			;
0269	0315			;
0270	0315	87	L75	.BYTE \$87,'EXECUT',\$C5
0270	0316	45 58		
0270	031C	C5		
0271	031D	60 02		.WORD L35 ; LINK TO CLIT
0272	031F	21 03	EXEC	.WORD *+2
0273	0321	B5 00		LDA 0,X
0274	0323	85 B1		STA W
0275	0325	B5 01		LDA 1,X
0276	0327	85 B2		STA W+1
0277	0329	E8		INX
0278	032A	E8		INX
0279	032B	4C B0 00		JMP W-1 To JMP (W) in z-page
0280	032E			;
0281	032E			;
0282	032E			;
0283	032E			;
0284	032E	86	L89	.BYTE \$86,'BRANC',\$C8
0284	032F	42 52		
0284	0334	C8		
0285	0335	15 03		.WORD L75 ; LINK TO EXECUTE
0286	0337	39 03	BRAN	.WORD *+2
0287	0339	18		CLC
0288	033A	B1 AE		LDA (IP),Y
0289	033C	65 AE		ADC IP
0290	033E	48		PHA
0291	033F	C8		INY
0292	0340	B1 AE		LDA (IP),Y
0293	0342	65 AF		ADC IP+1
0294	0344	85 AF		STA IP+1
0295	0346	68		PLA
0296	0347	85 AE		STA IP
0297	0349	4C 46 02		JMP NEXT+2
0298	034C			;
0299	034C			;
0300	034C			;
0301	034C			;
0302	034C	87	L107	.BYTE \$87,'OBRANC',\$C8
0302	034D	30 42		
0302	0353	C8		
0303	0354	2E 03		.WORD L89 ; LINK TO BRANCH
0304	0356	58 03	ZBRAN	.WORD *+2
0305	0358	E8		INX
0306	0359	E8		INX

LINE #	LOC	CODE	LINE
0307	035A	B5 FE	LDA \$FE,X
0308	035C	15 FF	ORA \$FF,X
0309	035E	F0 D9	BEQ BRAN+2
0310	0360		;
0311	0360	18	BUMP CLC
0312	0361	A5 AE	LDA IP
0313	0363	69 02	ADC #2
0314	0365	85 AE	STA IP
0315	0367	90 02	BCC L122
0316	0369	E6 AF	INC IP+1
0317	036B	4C 44 02	JMP NEXT
0318	036E		;
0319	036E		;
0320	036E		(LOOP) SCREEN 16 LINE 1
0321	036E		;
0322	036E	86	L127 .BYTE \$86,'(LOOP',\$A9
0322	036F	28 4C	
0322	0374	A9	
0323	0375	4C 03	.WORD L107 ; LINK TO OBRANCH
0324	0377	79 03	PLOOP .WORD L130
0325	0379	86 B5	L130 STX XSAVE
0326	037B	BA	TSX
0327	037C	FE 01 01	INC \$101,X
0328	037F	DO 03	BNE PL1
0329	0381	FE 02 01	INC \$102,X
0330	0384		;
0331	0384	18	PL1 CLC
0332	0385	BD 03 01	LDA \$103,X
0333	0388	FD 01 01	SBC \$101,X
0334	038B	BD 04 01	LDA \$104,X
0335	038E	FD 02 01	SBC \$102,X
0336	0391		;
0337	0391	A6 B5	PL2 LDX XSAVE
0338	0393	0A	ASL A
0339	0394	90 A3	BCC BRAN+2
0340	0396	68	PLA
0341	0397	68	PLA
0342	0398	68	PLA
0343	0399	68	PLA
0344	039A	4C 60 03	JMP BUMP
0345	039D		;
0346	039D		;
0347	039D		(+LOOP) SCREEN 16 LINE 8
0348	039D		;
0349	039D	87	L154 .BYTE \$87,'(+LOOP',\$A9
0349	039E	28 2B	
0349	03A4	A9	
0350	03A5	6E 03	.WORD L127
0351	03A7	A9 03	PPL00 .WORD *+2
0352	03A9	E8	INX
0353	03AA	E8	INX
0354	03AB	86 B5	STX XSAVE
0355	03AD	B5 FF	LDA \$FF,X
0356	03AF	48	PHA
0357	03B0	48	PHA

LINE #	LOC	CODE	LINE
0358	03B1	B5 FE	LDA \$FE,X
0359	03B3	BA	TSX
0360	03B4	E8	INX
0361	03B5	E8	INX
0362	03B6	18	CLC
0363	03B7	7D 01 01	ADC \$101,X
0364	03BA	9D 01 01	STA \$101,X
0365	03BD	68	PLA
0366	03BE	7D 02 01	ADC \$102,X
0367	03C1	9D 02 01	STA \$102,X
0368	03C4	68	PLA
0369	03C5	10 BD	BPL PL1
0370	03C7	18	CLC
0371	03C8	BD 01 01	LDA \$101,X
0372	03CB	FD 03 01	SBC \$103,X
0373	03CE	BD 02 01	LDA \$102,X
0374	03D1	FD 04 01	SBC \$104,X
0375	03D4	4C 91 03	JMP PL2
0376	03D7	;	
0377	03D7	;	(DO)
0378	03D7	;	SCREEN 17 LINE 2
0379	03D7	;	
0380	03D7	84	L185 .BYTE \$84,'(DO',\$A9
0380	03D8	28 44 4F	
0380	03DB	A9	
0381	03DC	9D 03	.WORD L154 ; LINK TO (+LOOP)
0382	03DE	E0 03	PDO .WORD *+2
0383	03E0	B5 03	LDA 3,X
0384	03E2	48	PHA
0385	03E3	B5 02	LDA 2,X
0386	03E5	48	PHA
0387	03E6	B5 01	LDA 1,X
0388	03E8	48	PHA
0389	03E9	B5 00	LDA 0,X
0390	03EB	48	PHA
0391	03EC	;	
0392	03EC	E8	POPTWO INX
0393	03ED	E8	INX
0394	03EE	;	
0395	03EE	E8	POP INX
0396	03EF	E8	INX
0397	03F0	4C 44 02	JMP NEXT
0398	03F3	;	
0399	03F3	;	I
0400	03F3	;	SCREEN 17 LINE 9
0401	03F3	;	
0402	03F3	81	L207 .BYTE \$81,\$C9
0402	03F4	C9	
0403	03F5	D7 03	.WORD L185 ; LINK TO (DO)
0404	03F7	5F 06	I .WORD R+2 Share the code for R
0405	03F9	;	
0406	03F9	;	DIGIT
0407	03F9	;	SCREEN 18 LINE 1
0408	03F9	;	
0409	03F9	85	L214 .BYTE \$85,'DIGI',\$D4

LINE #	LOC	CODE	LINE
0409	03FA	44 49	
0409	03FE	D4	
0410	03FF	E3 03	.WORD L207 ; LINK TO I
0411	0401	03 04	DIGIT .WORD *+2
0412	0403	38	SEC
0413	0404	B5 02	LDA 2,X
0414	0406	E9 30	SBC #\$30
0415	0408	30 18	BMI L234
0416	040A	C9 0A	CMP #\$A
0417	040C	30 07	BMI L227
0418	040E	38	SEC
0419	040F	E9 07	SBC #7
0420	0411	C9 0A	CMP #\$A
0421	0413	30 0D	BMI L234
0422	0415	D5 00	L227 CMP 0,X
0423	0417	10 09	BPL L234
0424	0419	95 02	STA 2,X
0425	041B	A9 01	LDA #1
0426	041D	48	PHA
0427	041E	98	TYA
0428	041F	4C 3F 02	JMP PUT ; exit true with converted value
0429	0422	98	L234 TYA
0430	0423	48	PHA
0431	0424	E8	INX
0432	0425	E8	INX
0433	0426	4C 3F 02	JMP PUT ; exit false for bad conversion
0434	0429		;
0435	0429		;
0436	0429		;
0437	0429		;
0438	0429	86	L243 .BYTE \$86, '(FIND', \$A9
0438	042A	28 46	
0438	042F	A9	
0439	0430	F9 03	.WORD L214 ; LINK TO DIGIT
0440	0432	34 04	PFIND .WORD *+2
0441	0434	A9 02	LDA #2
0442	0436	20 04 03	JSR SETUP
0443	0439	86 B5	STX XSAVE
0444	043B	A0 00	L249 LDY #0
0445	043D	B1 A6	LDA (N), Y
0446	043F	51 A8	EOR (N+2), Y
0447	0441	29 3F	AND #\$3F
0448	0443	D0 2D	BNE L281
0449	0445	C8	L254 INY
0450	0446	B1 A6	LDA (N), Y
0451	0448	51 A8	EOR (N+2), Y
0452	044A	0A	ASL A
0453	044B	D0 23	BNE L280
0454	044D	90 F6	BCC L254
0455	044F	A6 B5	LDX XSAVE
0456	0451	CA	DEX
0457	0452	CA	DEX
0458	0453	CA	DEX
0459	0454	CA	DEX
0460	0455	18	CLC

LINE #	LOC	CODE	LINE
0461	0456	98	TYA
0462	0457	69 05	ADC #5
0463	0459	65 A6	ADC N
0464	045B	95 02	STA 2,X
0465	045D	A0 00	LDY #0
0466	045F	98	TYA
0467	0460	65 A7	ADC N+1
0468	0462	95 03	STA 3,X
0469	0464	94 01	STY 1,X
0470	0466	B1 A6	LDA (N),Y
0471	0468	95 00	STA 0,X
0472	046A	A9 01	LDA #1
0473	046C	48	PHA
0474	046D	4C 3D 02	JMP PUSH
0475	0470	B0 05	L280 BCS L284
0476	0472	C8	L281 INY
0477	0473	B1 A6	LDA (N),Y
0478	0475	10 FB	BPL L281
0479	0477	C8	L284 INY
0480	0478	B1 A6	LDA (N),Y
0481	047A	AA	TAX
0482	047B	C8	INY
0483	047C	B1 A6	LDA (N),Y
0484	047E	85 A7	STA N+1
0485	0480	86 A6	STX N
0486	0482	05 A6	ORA N
0487	0484	D0 B5	BNE L249
0488	0486	A6 B5	LDX XSAVE
0489	0488	A9 00	LDA #0
0490	048A	48	PHA
0491	048B	4C 3D 02	JMP PUSH exit false upon reading null link
0492	048E	;	
0493	048E	;	
0494	048E	;	
0495	048E	;	
0496	048E	87	L301 .BYTE \$87,'ENCLOS',\$C5
0496	048F	45 4E	
0496	0495	C5	
0497	0496	29 04	.WORD L243 ; LINK TO (FIND)
0498	0498	9A 04	.WORD *+2
0499	049A	A9 02	LDA #2
0500	049C	20 04 03	JSR SETUP
0501	049F	8A	TXA
0502	04A0	38	SEC
0503	04A1	E9 08	SBC #8
0504	04A3	AA	TAX
0505	04A4	94 03	STY 3,X
0506	04A6	94 01	STY 1,X
0507	04A8	88	DEY
0508	04A9	C8	L313 INY
0509	04AA	B1 A8	LDA (N+2),Y
0510	04AC	C5 A6	CMP N
0511	04AE	F0 F9	BEQ L313
0512	04B0	94 04	STY 4,X
0513	04B2	B1 A8	L318 LDA (N+2),Y

LINE #	LOC	CODE	LINE	
0514	04B4	D0 0E	BNE L327	
0515	04B6	94 02	STY 2,X	
0516	04B8	94 00	STY 0,X	
0517	04BA	98	TYA	
0518	04BB	D5 04	CMP 4,X	
0519	04BD	D0 02	BNE L326	
0520	04BF	F6 02	INC 2,X	
0521	04C1	4C 44 02	L326 JMP NEXT	
0522	04C4	94 02	L327 STY 2,X	
0523	04C6	C8	INY	
0524	04C7	C5 A6	CMP N	
0525	04C9	D0 E7	BNE L318	
0526	04CB	94 00	STY 0,X	
0527	04CD	4C 44 02	JMP NEXT	
0528	04D0	;		
0529	04D0	;		EMIT
0530	04D0	;		SCREEN 21 LINE 5
0531	04D0	;		
0532	04D0	84	L337 .BYTE \$84,'EMI',\$D4	
0532	04D1	45 4D 49		
0532	04D4	D4		
0533	04D5	8E 04	.WORD L301	; LINK TO ENCLOSE
0534	04D7	F1 15	.WORD XEMIT	Vector to code for EMIT
0535	04D9	;		
0536	04D9	;		KEY
0537	04D9	;		SCREEN 21 LINE 7
0538	04D9	;		
0539	04D9	83	L344 .BYTE \$83,'KE',\$D9	
0539	04DA	4B 45		
0539	04DC	D9		
0540	04DD	D0 04	.WORD L337	; LINK TO EMIT
0541	04DF	0C 16	.WORD XKEY	Vector to code for KEY
0542	04E1	;		
0543	04E1	;		?TERMINAL
0544	04E1	;		SCREEN 21 LINE 9
0545	04E1	;		
0546	04E1	89	L351 .BYTE \$89,'?TERMINA',\$CC	
0546	04E2	3F 54		
0546	04EA	CC		
0547	04EB	D9 04	.WORD L344	; LINK TO KEY
0548	04ED	16 16	QTERM .WORD XQTER	Vector to code for ?TERMINA
0549	04EF	;		
0550	04EF	;		CR
0551	04EF	;		SCREEN 21 LINE 11
0552	04EF	;		
0553	04EF	82	L358 .BYTE \$82,'C',\$D2	
0553	04F0	43		
0553	04F1	D2		
0554	04F2	E1 04	.WORD L351	; LINK TO ?TERMINAL
0555	04F4	21 16	CR .WORD XCR	Vector to code for CR
0556	04F6	;		
0557	04F6	;		CMOVE
0558	04F6	;		SCREEN 22 LINE 1
0559	04F6	;		
0560	04F6	85	L365 .BYTE \$85,'CMOV',\$C5	

LINE # LOC CODE LINE

0560	04F7	43 4D	
0560	04FB	C5	
0561	04FC	EF 04	.WORD L358 ; LINK TO CR
0562	04FE	00 05	CMOVE .WORD *+2
0563	0500	A9 03	LDA #3
0564	0502	20 04 03	JSR SETUP
0565	0505	C4 A6	L370 CPY N
0566	0507	D0 07	BNE L375
0567	0509	C6 A7	DEC N+1
0568	050B	10 03	BPL L375
0569	050D	4C 44 02	JMP NEXT
0570	0510	B1 AA	L375 LDA (N+4),Y
0571	0512	91 A8	STA (N+2),Y
0572	0514	C8	INY
0573	0515	D0 EE	BNE L370
0574	0517	E6 AB	INC N+5
0575	0519	E6 A9	INC N+3
0576	051B	4C 05 05	JMP L370
0577	051E		;
0578	051E		;
0579	051E		;
0580	051E		;
0581	051E	82	L386 .BYTE \$82,'U',\$AA U*
0581	051F	55	
0581	0520	AA	
0582	0521	F6 04	.WORD L365 ; LINK TO CMOVE
0583	0523	25 05	USTAR .WORD *+2
0584	0525	B5 02	LDA 2,X
0585	0527	85 A6	STA N
0586	0529	94 02	STY 2,X
0587	052B	B5 03	LDA 3,X
0588	052D	85 A7	STA N+1
0589	052F	94 03	STY 3,X
0590	0531	A0 10	LDY #16 for 16 bits
0591	0533	16 02	L396 ASL 2,X
0592	0535	36 03	ROL 3,X
0593	0537	36 00	ROL 0,X
0594	0539	36 01	ROL 1,X
0595	053B	90 13	BCC L411
0596	053D	18	CLC
0597	053E	A5 A6	LDA N
0598	0540	75 02	ADC 2,X
0599	0542	95 02	STA 2,X
0600	0544	A5 A7	LDA N+1
0601	0546	75 03	ADC 3,X
0602	0548	95 03	STA 3,X
0603	054A	A9 00	LDA #0
0604	054C	75 00	ADC 0,X
0605	054E	95 00	STA 0,X
0606	0550	88	L411 DEY
0607	0551	D0 E0	BNE L396
0608	0553	4C 44 02	JMP NEXT
0609	0556		;
0610	0556		;
0611	0556		;

U/
SCREEN 24 LINE 1

LINE #	LOC	CODE	LINE
0612	0556		;
0613	0556	82	L418 .BYTE \$82, 'U', \$AF
0613	0557	55	
0613	0558	AF	
0614	0559	1E 05	.WORD L386 ; LINK TO U*
0615	055B	5D 05	USLAS .WORD *+2
0616	055D	B5 04	LDA 4,X
0617	055F	B4 02	LDY 2,X
0618	0561	94 04	STY 4,X
0619	0563	0A	ASL A
0620	0564	95 02	STA 2,X
0621	0566	B5 05	LDA 5,X
0622	0568	B4 03	LDY 3,X
0623	056A	94 05	STY 5,X
0624	056C	2A	ROL A
0625	056D	95 03	STA 3,X
0626	056F	A9 10	LDA #16 for 16 bits
0627	0571	85 A6	STA N
0628	0573	36 04	L433 ROL 4,X
0629	0575	36 05	ROL 5,X
0630	0577	38	SEC
0631	0578	B5 04	LDA 4,X
0632	057A	F5 00	SBC 0,X
0633	057C	A8	TAY
0634	057D	B5 05	LDA 5,X
0635	057F	F5 01	SBC 1,X
0636	0581	90 04	BCC L444
0637	0583	94 04	STY 4,X
0638	0585	95 05	STA 5,X
0639	0587	36 02	L444 ROL 2,X
0640	0589	36 03	ROL 3,X
0641	058B	C6 A6	DEC N
0642	058D	D0 E4	BNE L433
0643	058F	4C EE 03	JMP POP
0644	0592		;
0645	0592		;
0646	0592		;
0647	0592		;
0648	0592	83	L453 .BYTE \$83, 'AN', \$C4
0648	0593	41 4E	
0648	0595	C4	
0649	0596	56 05	.WORD L418 ; LINK TO U/
0650	0598	9A 05	ANDD .WORD *+2
0651	059A	B5 00	LDA 0,X
0652	059C	35 02	AND 2,X
0653	059E	48	PHA
0654	059F	B5 01	LDA 1,X
0655	05A1	35 03	AND 3,X
0656	05A3		;
0657	05A3	E8	BINARY INX
0658	05A4	E8	INX
0659	05A5	4C 3F 02	JMP PUT
0660	05A8		;
0661	05A8		;
0662	05A8		;
			OR
			SCREEN 25 LINE 7

LINE #	LOC	CODE	LINE	
0663	05A8		;	
0664	05A8	82	L469 .BYTE \$82,'0',\$D2	
0664	05A9	4F		
0664	05AA	D2		
0665	05AB	92 05	.WORD L453	; LINK TO AND
0666	05AD	AF 05	OR .WORD *+2	
0667	05AF	B5 00	LDA 0,X	
0668	05B1	15 02	ORA 2,X	
0669	05B3	48	PHA	
0670	05B4	B5 01	LDA 1,X	
0671	05B6	15 03	ORA 3,X	
0672	05B8	E8	INX	
0673	05B9	E8	INX	
0674	05BA	4C 3F 02	JMP PUT	
0675	05BD		;	
0676	05BD		;	XOR
0677	05BD		;	SCREEN 25 LINE 11
0678	05BD		;	
0679	05BD	83	L484 .BYTE \$83,'XO',\$D2	
0679	05BE	58 4F		
0679	05C0	D2		
0680	05C1	A8 05	.WORD L469	; LINK TO OR
0681	05C3	C5 05	XOR .WORD *+2	
0682	05C5	B5 00	LDA 0,X	
0683	05C7	55 02	EOR 2,X	
0684	05C9	48	PHA	
0685	05CA	B5 01	LDA 1,X	
0686	05CC	55 03	EOR 3,X	
0687	05CE	E8	INX	
0688	05CF	E8	INX	
0689	05D0	4C 3F 02	JMP PUT	
0690	05D3		;	
0691	05D3		;	SP@
0692	05D3		;	SCREEN 26 LINE 1
0693	05D3		;	
0694	05D3	83	L499 .BYTE \$83,'SP',\$C0	
0694	05D4	53 50		
0694	05D6	C0		
0695	05D7	BD 05	.WORD L484	; LINK TO XOR
0696	05D9	DB 05	SPAT .WORD *+2	
0697	05DB	8A	TXA	
0698	05DC		;	
0699	05DC	48	PUSHOA PHA	
0700	05DD	A9 00	LDA #0	
0701	05DF	4C 3D 02	JMP PUSH	
0702	05E2		;	
0703	05E2		;	SP!
0704	05E2		;	SCREEN 26 LINE 5
0705	05E2		;	
0706	05E2	83	L511 .BYTE \$83,'SP',\$A1	
0706	05E3	53 50		
0706	05E5	A1		
0707	05E6	D3 05	.WORD L499	; LINK TO SP@
0708	05E8	EA 05	SPSTO .WORD *+2	
0709	05EA	A0 06	LDY #6	

LINE #	LOC	CODE	LINE
0710	05EC	B1 B3	LDA (UP),Y load data stack pointer (X-reg) from
0711	05EE	AA	TAX silent user variable S0.
0712	05EF	4C 44 02	JMP NEXT
0713	05F2	;	
0714	05F2	;	RP!
0715	05F2	;	SCREEN 26 LINE 8
0716	05F2	;	
0717	05F2	83	L522 .BYTE \$83,'RP',\$A1
0717	05F3	52 50	
0717	05F5	A1	
0718	05F6	E2 05	.WORD L511 ; LINK TO SP!
0719	05F8	FA 05	RPSTO .WORD *+2
0720	05FA	86 B5	STX XSAVE load return stack pointer
0721	05FC	A0 08	LDY #8 (machine stack pointer) from
0722	05FE	B1 B3	LDA (UP),Y silent user variable R0.
0723	0600	AA	TAX
0724	0601	9A	TXS
0725	0602	A6 B5	LDX XSAVE
0726	0604	4C 44 02	JMP NEXT
0727	0607	;	
0728	0607	;	;
0729	0607	;	SCREEN 26 LINE 12
0730	0607	;	
0731	0607	82	L536 .BYTE \$82,';',\$D3
0731	0608	3B	
0731	0609	D3	
0732	060A	F2 05	.WORD L522 ; LINK TO RP!
0733	060C	0E 06	SEMIS .WORD *+2
0734	060E	68	PLA
0735	060F	85 AE	STA IP
0736	0611	68	PLA
0737	0612	85 AF	STA IP+1
0738	0614	4C 44 02	JMP NEXT
0739	0617	;	
0740	0617	;	LEAVE
0741	0617	;	SCREEN 27 LINE 1
0742	0617	;	
0743	0617	85	L548 .BYTE \$85,'LEAV',\$C5
0743	0618	4C 45	
0743	061C	C5	
0744	061D	07 06	.WORD L536 ; LINK TO ;S
0745	061F	21 06	LEAVE .WORD *+2
0746	0621	86 B5	STX XSAVE
0747	0623	BA	TSX
0748	0624	BD 01 01	LDA \$101,X
0749	0627	9D 03 01	STA \$103,X
0750	062A	BD 02 01	LDA \$102,X
0751	062D	9D 04 01	STA \$104,X
0752	0630	A6 B5	LDX XSAVE
0753	0632	4C 44 02	JMP NEXT
0754	0635	;	
0755	0635	;	>R
0756	0635	;	SCREEN 27 LINE 5
0757	0635	;	
0758	0635	82	L563 .BYTE \$82,'>',\$D2

LINE #	LOC	CODE	LINE
0758	0636	3E	
0758	0637	D2	
0759	0638	17 06	.WORD L548 ; LINK TO LEAVE
0760	063A	3C 06	TOR .WORD *+2
0761	063C	B5 01	LDA 1,X move high byte
0762	063E	48	PHA
0763	063F	B5 00	LDA 0,X then low byte
0764	0641	48	PHA to return stack
0765	0642	E8	INX
0766	0643	E8	INX popping off data stack
0767	0644	4C 44 02	JMP NEXT
0768	0647	;	
0769	0647	;	
0770	0647	;	R> SCREEN 27 LINE 8
0771	0647	;	
0772	0647	82	L577 .BYTE \$82,'R',\$BE
0772	0648	52	
0772	0649	BE	
0773	064A	35 06	.WORD L563 ; LINK TO >R
0774	064C	4E 06	RFROM .WORD *+2
0775	064E	CA	DEX make room on data stack
0776	064F	CA	DEX
0777	0650	68	PLA high byte
0778	0651	95 00	STA 0,X
0779	0653	68	PLA then low byte
0780	0654	95 01	STA 1,X restored to data stack
0781	0656	4C 44 02	JMP NEXT
0782	0659	;	
0783	0659	;	
0784	0659	;	R SCREEN 27 LINE 11
0785	0659	;	
0786	0659	81	L591 .BYTE \$81,\$D2
0786	065A	D2	
0787	065B	47 06	.WORD L577 ; LINK TO R>
0788	065D	5F 06	R .WORD *+2
0789	065F	86 B5	STX XSAVE
0790	0661	BA	TSX address return stack.
0791	0662	BD 01 01	LDA \$101,X copy bottom value
0792	0665	48	PHA to data stack.
0793	0666	BD 02 01	LDA \$102,X
0794	0669	A6 B5	LDX XSAVE
0795	066B	4C 3D 02	JMP PUSH
0796	066E	;	
0797	066E	;	O=
0798	066E	;	SCREEN 28 LINE 2
0799	066E	;	
0800	066E	82	L605 .BYTE \$82,'O',\$BD
0800	066F	30	
0800	0670	BD	
0801	0671	59 06	.WORD L591 ; LINK TO R
0802	0673	75 06	ZEQU .WORD *+2
0803	0675	B5 00	LDA 0,X
0804	0677	15 01	ORA 1,X
0805	0679	94 01	STY 1,X
0806	067B	D0 01	BNE L613

LINE #	LOC	CODE	LINE
0807	067D	C8	INY
0808	067E	94 00	L613 STY 0,X
0809	0680	4C 44 02	JMP NEXT
0810	0683	;	
0811	0683	;	0<
0812	0683	;	SCREEN 28 LINE 6
0813	0683	;	
0814	0683	82	L619 .BYTE \$82,'0',\$BC
0814	0684	30	
0814	0685	BC	
0815	0686	6E 06	.WORD L605 ; LINK TO 0=
0816	0688	8A 06	.WORD *+2
0817	068A	16 01	ASL 1,X
0818	068C	98	TYA
0819	068D	2A	ROL A
0820	068E	94 01	STY 1,X
0821	0690	95 00	STA 0,X
0822	0692	4C 44 02	JMP NEXT
0823	0695	;	
0824	0695	;	
0825	0695	;	+
0826	0695	;	SCREEN 29 LINE 1
0827	0695	;	
0828	0695	81	L632 .BYTE \$81,\$AB
0828	0696	AB	
0829	0697	83 06	.WORD L619 ; LINK TO V-ADJ
0830	0699	9B 06	.WORD *+2
0831	069B	18	CLC
0832	069C	B5 00	LDA 0,X
0833	069E	75 02	ADC 2,X
0834	06A0	95 02	STA 2,X
0835	06A2	B5 01	LDA 1,X
0836	06A4	75 03	ADC 3,X
0837	06A6	95 03	STA 3,X
0838	06A8	E8	INX
0839	06A9	E8	INX
0840	06AA	4C 44 02	JMP NEXT
0841	06AD	;	
0842	06AD	;	D+
0843	06AD	;	SCREEN 29 LINE 4
0844	06AD	;	
0845	06AD	82	L649 .BYTE \$82,'D',\$AB
0845	06AE	44	
0845	06AF	AB	
0846	06B0	95 06	.WORD L632 ; LINK TO +
0847	06B2	B4 06	.WORD *+2
0848	06B4	18	CLC
0849	06B5	B5 02	LDA 2,X
0850	06B7	75 06	ADC 6,X
0851	06B9	95 06	STA 6,X
0852	06BB	B5 03	LDA 3,X
0853	06BD	75 07	ADC 7,X
0854	06BF	95 07	STA 7,X
0855	06C1	B5 00	LDA 0,X
0856	06C3	75 04	ADC 4,X

LINE #	LOC	CODE	LINE
0857	06C5	95 04	STA 4,X
0858	06C7	B5 01	LDA 1,X
0859	06C9	75 05	ADC 5,X
0860	06CB	95 05	STA 5,X
0861	06CD	4C EC 03	JMP POPTWO
0862	06D0		;
0863	06D0		;
0864	06D0		;
0865	06D0		;
0866	06D0	85	L670 .BYTE \$85,'MINU',\$D3
0866	06D1	4D 49	
0866	06D5	D3	
0867	06D6	AD 06	.WORD L649 ; LINK TO D+
0868	06D8	DA 06	MINUS .WORD *+2
0869	06DA	38	SEC
0870	06DB	98	TYA
0871	06DC	F5 00	SBC 0,X
0872	06DE	95 00	STA 0,X
0873	06E0	98	TYA
0874	06E1	F5 01	SBC 1,X
0875	06E3	95 01	STA 1,X
0876	06E5	4C 44 02	JMP NEXT
0877	06E8		;
0878	06E8		;
0879	06E8		;
0880	06E8		;
0881	06E8	86	L685 .BYTE \$86,'DMINU',\$D3
0881	06E9	44 4D	
0881	06EE	D3	
0882	06EF	D0 06	.WORD L670 ; LINK TO MINUS
0883	06F1	F3 06	DMINU .WORD *+2
0884	06F3	38	SEC
0885	06F4	98	TYA
0886	06F5	F5 02	SBC 2,X
0887	06F7	95 02	STA 2,X
0888	06F9	98	TYA
0889	06FA	F5 03	SBC 3,X
0890	06FC	95 03	STA 3,X
0891	06FE	4C DB 06	JMP MINUS+3
0892	0701		;
0893	0701		;
0894	0701		;
0895	0701		;
0896	0701	84	L700 .BYTE \$84,'OVE',\$D2
0896	0702	4F 56 45	
0896	0705	D2	
0897	0706	E8 06	.WORD L685 ; LINK TO DMINUS
0898	0708	0A 07	OVER .WORD *+2
0899	070A	B5 02	LDA 2,X
0900	070C	48	PHA
0901	070D	B5 03	LDA 3,X
0902	070F	4C 3D 02	JMP PUSH
0903	0712		;
0904	0712		;
0905	0712		;
			DROP
			SCREEN 30 LINE 4

LINE #	LOC	CODE	LINE
0906	0712		;
0907	0712	84	L711 .BYTE \$84, 'DRO', \$D0
0907	0713	44 52 4F	
0907	0716	D0	
0908	0717	01 07	.WORD L700 ; LINK TO OVER
0909	0719	EE 03	DROP .WORD POP
0910	071B		;
0911	071B		;
0912	071B		SWAP SCREEN 30 LINE 8
0913	071B		;
0914	071B	84	L718 .BYTE \$84, 'SWA', \$D0
0914	071C	53 57 41	
0914	071F	D0	
0915	0720	12 07	.WORD L711 ; LINK TO DROP
0916	0722	24 07	SWAP .WORD *+2
0917	0724	B5 02	LDA 2,X
0918	0726	48	PHA
0919	0727	B5 00	LDA 0,X
0920	0729	95 02	STA 2,X
0921	072B	B5 03	LDA 3,X
0922	072D	B4 01	LDY 1,X
0923	072F	94 03	STY 3,X
0924	0731	4C 3F 02	JMP PUT
0925	0734		;
0926	0734		;
0927	0734		SCREEN 30 LINE 12
0928	0734		;
0929	0734	83	L733 .BYTE \$83, 'DU', \$D0
0929	0735	44 55	
0929	0737	D0	
0930	0738	1B 07	.WORD L718 ; LINK TO SWAP
0931	073A	3C 07	DUP .WORD *+2
0932	073C	B5 00	LDA 0,X
0933	073E	48	PHA
0934	073F	B5 01	LDA 1,X
0935	0741	4C 3D 02	JMP PUSH
0936	0744		;
0937	0744		;
0938	0744		+
0939	0744		SCREEN 31 LINE 2
0940	0744	82	L744 .BYTE \$82, '+', \$A1
0940	0745	2B	
0940	0746	A1	
0941	0747	34 07	.WORD L733 ; LINK TO DUP
0942	0749	4B 07	PSTOR .WORD *+2
0943	074B	18	CLC
0944	074C	A1 00	LDA (0,X) fetch 16-bit value addressed
0945	074E	75 02	by bottom of stack, adding to
0946	0750	81 00	STA (0,X) second item on stack, and
0947	0752	F6 00	INC 0,X return to memory.
0948	0754	D0 02	BNE L754
0949	0756	F6 01	INC 1,X
0950	0758	A1 00	L754 LDA (0,X)
0951	075A	75 03	ADC 3,X
0952	075C	81 00	STA (0,X)

LINE #	LOC	CODE	LINE
0953	075E	4C EC 03	JMP POPTWO
0954	0761		;
0955	0761		;
0956	0761		TOGGLE
0957	0761		SCREEN 31 LINE 7
0958	0761	86	L762 .BYTE \$86,'TOGGL',\$C5
0958	0762	54 4F	
0958	0767	C5	
0959	0768	44 07	.WORD L744 ; LINK TO +!
0960	076A	6C 07	TOGGL .WORD *+2
0961	076C	A1 02	LDA (2,X) complement bits in memory address
0962	076E	55 00	EOR 0,X second on stack, by pattern
0963	0770	81 02	STA (2,X) on bottom of stack.
0964	0772	4C EC 03	JMP POPTWO
0965	0775		;
0966	0775		;
0967	0775		SCREEN 32 LINE 1 @
0968	0775		;
0969	0775	81	L773 .BYTE \$81,\$C0
0969	0776	C0	
0970	0777	61 07	.WORD L762 ; LINK TO TOGGLE
0971	0779	7B 07	AT .WORD *+2
0972	077B	A1 00	LDA (0,X)
0973	077D	48	PHA
0974	077E	F6 00	INC 0,X
0975	0780	D0 02	BNE L781
0976	0782	F6 01	INC 1,X
0977	0784	A1 00	L781 LDA (0,X)
0978	0786	4C 3F 02	JMP PUT
0979	0789		;
0980	0789		;
0981	0789		SCREEN 32 LINE 5 C@
0982	0789		;
0983	0789	82	L787 .BYTE \$82,'C',\$C0
0983	078A	43	
0983	078B	C0	
0984	078C	75 07	.WORD L773 ; LINK TO @
0985	078E	90 07	CAT .WORD *+2
0986	0790	A1 00	LDA (0,X) fetch byte addressed by bottom
0987	0792	95 00	STA 0,X of stack to stack, zeroing
0988	0794	94 01	STY 1,X the high byte.
0989	0796	4C 44 02	JMP NEXT
0990	0799		;
0991	0799		;
0992	0799		SCREEN 32 LINE 8 !
0993	0799		;
0994	0799	81	L798 .BYTE \$81,\$A1
0994	079A	A1	
0995	079B	89 07	.WORD L787 ; LINK TO C@
0996	079D	9F 07	STORE .WORD *+2
0997	079F	B5 02	LDA 2,X
0998	07A1	81 00	STA (0,X) store second 16-bit value on stack
0999	07A3	F6 00	INC 0,X to memory as addresses by
1000	07A5	D0 02	BNE L806
1001	07A7	F6 01	INC 1,X bottom of stack.

LINE #	LOC	CODE	LINE
1002	07A9	B5 03	L806 LDA 3,X
1003	07AB	81 00	STA (0,X)
1004	07AD	4C EC 03	JMP POPTWO
1005	07B0		;
1006	07B0		;
1007	07B0		;
1008	07B0		;
1009	07B0	82	L813 .BYTE \$82,'C',\$A1
1009	07B1	43	
1009	07B2	A1	
1010	07B3	99 07	.WORD L798 ; LINK TO !
1011	07B5	B7 07	CSTOR .WORD *+2
1012	07B7	B5 02	LDA 2,X
1013	07B9	81 00	STA (0,X)
1014	07BB	4C EC 03	JMP POPTWO
1015	07BE		;
1016	07BE		;
1017	07BE		;
1018	07BE		;
1019	07BE	C1	L823 .BYTE \$C1,\$BA
1019	07BF	BA	
1020	07C0	B0 07	.WORD L813 ; LINK TO C!
1021	07C2	D6 07	COLON .WORD DOCOL
1022	07C4	42 0B	.WORD QEXEC
1023	07C6	FE 0A	.WORD SCSP
1024	07C8	58 09	.WORD CURR
1025	07CA	79 07	.WORD AT
1026	07CC	4B 09	.WORD CON
1027	07CE	9D 07	.WORD STORE
1028	07D0	36 10	.WORD CREAT
1029	07D2	C3 0B	.WORD RBRAC
1030	07D4	12 0C	.WORD PSCOD
1031	07D6		;
1032	07D6	A5 AF	DOCOL LDA IP+1
1033	07D8	48	PHA
1034	07D9	A5 AE	LDA IP
1035	07DB	48	PHA
1036	07DC	20 BE 02	JSR TCOLON Mark the start of a traced : def.
1037	07DF	18	CLC
1038	07E0	A5 B1	LDA W
1039	07E2	69 02	ADC #2
1040	07E4	85 AE	STA IP
1041	07E6	98	TYA
1042	07E7	65 B2	ADC W+1
1043	07E9	85 AF	STA IP+1
1044	07EB	4C 44 02	JMP NEXT
1045	07EE		;
1046	07EE		;
1047	07EE		;
1048	07EE		;
1049	07EE		;
1050	07EE	C1	L853 .BYTE \$C1,\$BB
1050	07EF	BB	
1051	07FO	BE 07	.WORD L823 ; LINK TO :
1052	07F2	D6 07	.WORD DOCOL

LINE #	LOC	CODE	LINE
1053	07F4	6A 0B	.WORD QCSP
1054	07F6	9F 0B	.WORD COMP
1055	07F8	0C 06	.WORD SEMIS
1056	07FA	D7 0B	.WORD SMUDG
1057	07FC	B5 0B	.WORD LBRAC
1058	07FE	0C 06	.WORD SEMIS
1059	0800		;
1060	0800		;
1061	0800		;
1062	0800		;
1063	0800		;
1064	0800	88	L867 .BYTE \$88,'CONSTAN',\$D4
1064	0801	43 4F	
1064	0808	D4	
1065	0809	EE 07	.WORD L853 ; LINK TO ;
1066	080B	D6 07	CONST .WORD DOCOL
1067	080D	36 10	.WORD CREAT
1068	080F	D7 0B	.WORD SMUDG
1069	0811	D9 09	.WORD COMMA
1070	0813	12 0C	.WORD PSCOD
1071	0815		;
1072	0815	A0 02	DOCON LDY #2
1073	0817	B1 B1	LDA (W),Y
1074	0819	48	PHA
1075	081A	C8	INY
1076	081B	B1 B1	LDA (W),Y
1077	081D	4C 3D 02	JMP PUSH
1078	0820		;
1079	0820		;
1080	0820		;
1081	0820		;
1082	0820	88	L885 .BYTE \$88,'VARIABL',\$C5
1082	0821	56 41	
1082	0828	C5	
1083	0829	00 08	.WORD L867 ; LINK TO CONSTANT
1084	082B	D6 07	VAR .WORD DOCOL
1085	082D	0B 08	.WORD CONST
1086	082F	12 0C	.WORD PSCOD
1087	0831		;
1088	0831	18	DOVAR CLC
1089	0832	A5 B1	LDA W
1090	0834	69 02	ADC #2
1091	0836	48	PHA
1092	0837	98	TYA
1093	0838	65 B2	ADC W+1
1094	083A	4C 3D 02	JMP PUSH
1095	083D		;
1096	083D		;
1097	083D		;
1098	083D		.FILE FOR2/1 ; LINK TO NEXT FILE
1099	083D		;
1100	083D		;
1101	083D		;
1102	083D		;
1103	083D	84	L902 .BYTE \$84,'USE',\$D2

LINE #	LOC	CODE	LINE
1103	083E	55 53 45	
1103	0841	D2	
1104	0842	20 08	.WORD L885 ; LINK TO VARIABLE
1105	0844	D6 07	USER .WORD DOCOL
1106	0846	OB 08	.WORD CONST
1107	0848	12 OC	.WORD PSCOD
1108	084A		;
1109	084A	A0 02	DOUSE LDY #2
1110	084C	18	CLC
1111	084D	B1 B1	LDA (W),Y
1112	084F	65 B3	ADC UP
1113	0851	48	PHA
1114	0852	A9 00	LDA #0
1115	0854	65 B4	ADC UP+1
1116	0856	4C 3D 02	JMP PUSH
1117	0859		;
1118	0859		;
1119	0859		;
1120	0859		;
1121	0859	81	L920 .BYTE \$81,\$B0
1121	085A	B0	
1122	085B	3D 08	.WORD L902 ; LINK TO USER
1123	085D	15 08	ZERO .WORD DOCON
1124	085F	00 00	.WORD 0
1125	0861		;
1126	0861		;
1127	0861		;
1128	0861		;
1129	0861	81	L928 .BYTE \$81,\$B1
1129	0862	B1	
1130	0863	59 08	.WORD L920 ; LINK TO 0
1131	0865	15 08	ONE .WORD DOCON
1132	0867	01 00	.WORD 1
1133	0869		;
1134	0869		;
1135	0869		;
1136	0869		;
1137	0869	81	L936 .BYTE \$81,\$B2
1137	086A	B2	
1138	086B	61 08	.WORD L928 ; LINK TO 1
1139	086D	15 08	TWO .WORD DOCON
1140	086F	02 00	.WORD 2
1141	0871		;
1142	0871		;
1143	0871		;
1144	0871		;
1145	0871	81	L944 .BYTE \$81,\$B3
1145	0872	B3	
1146	0873	69 08	.WORD L936 ; LINK TO 2
1147	0875	15 08	THREE .WORD DOCON
1148	0877	03 00	.WORD 3
1149	0879		;
1150	0879		;
1151	0879		;
1152	0879		;
			BL SCREEN 35 LINE 4

LINE #	LOC	CODE	LINE
1153	0879	82	L952 .BYTE \$82,'B',\$CC
1153	087A	42	
1153	087B	CC	
1154	087C	71 08	.WORD L944 ; LINK TO 3
1155	087E	15 08	BL .WORD DOCON
1156	0880	20 00	.WORD \$20
1157	0882		;
1158	0882		;
1159	0882		;
1160	0882		;
1161	0882	83	L960 .BYTE \$83,'C/',\$CC
1161	0883	43 2F	
1161	0885	CC	
1162	0886	79 08	.WORD L952 ; LINK TO BL
1163	0888	15 08	CSLL .WORD DOCON
1164	088A	40 00	.WORD 64
1165	088C		;
1166	088C		;
1167	088C		;
1168	088C		;
1169	088C	85	L968 .BYTE \$85,'FIRS',\$D4
1169	088D	46 49	
1169	0891	D4	
1170	0892	82 08	.WORD L960 ; LINK TO C/L
1171	0894	15 08	FIRST .WORD DOCON
1172	0896	60 3B	.WORD DAREA bottom of disk buffer area
1173	0898		;
1174	0898		;
1175	0898		;
1176	0898		;
1177	0898	85	L976 .BYTE \$85,'LIMI',\$D4
1177	0899	4C 49	
1177	089D	D4	
1178	089E	8C 08	.WORD L968 ; LINK TO FIRST
1179	08A0	15 08	LIMIT .WORD DOCON
1180	08A2	80 3F	.WORD UAREA buffers end at user area
1181	08A4		;
1182	08A4		;
1183	08A4		;
1184	08A4		;
1185	08A4	85	L984 .BYTE \$85,'B/BU',\$C6
1185	08A5	42 2F	
1185	08A9	C6	
1186	08AA	98 08	.WORD L976 ; LINK TO LIMIT
1187	08AC	15 08	BBUF .WORD DOCON
1188	08AE	80 00	.WORD SSIZE sector size
1189	08B0		;
1190	08B0		;
1191	08B0		;
1192	08B0		;
1193	08B0	85	L992 .BYTE \$85,'B/SC',\$D2
1193	08B1	42 2F	
1193	08B5	D2	
1194	08B6	A4 08	.WORD L984 ; LINK TO B/BUF
1195	08B8	15 08	BSCR .WORD DOCON

LINE #	LOC	CODE	LINE
1196	08BA	08 00	.WORD 8 blocks to make one screen.
1197	08BC		;
1198	08BC		;
1199	08BC		+ORIGIN
1200	08BC		SCREEN 35 LINE 12
1201	08BC	87	L1000 .BYTE \$87, '+ORIG', \$CE
1201	08BD	2B 4F	
1201	08C3	CE	
1202	08C4	B0 08	.WORD L992 ; LINK TO B/SCR
1203	08C6	D6 07	PORIG .WORD DOCOL
1204	08C8	2A 02	.WORD LIT, ORIG
1204	08CA	00 02	
1205	08CC	99 06	.WORD PLUS
1206	08CE	0C 06	.WORD SEMIS
1207	08D0		;
1208	08D0		;
1209	08D0		;
1210	08D0		;
1211	08D0	83	L1010 .BYTE \$83, 'TI', \$C2
1211	08D1	54 49	
1211	08D3	C2	
1212	08D4	BC 08	.WORD L1000 ; LINK TO +ORIGIN
1213	08D6	4A 08	TIB .WORD DOUSE
1214	08D8	0A	.BYTE \$A
1215	08D9		;
1216	08D9		;
1217	08D9		;
1218	08D9		;
1219	08D9	85	L1018 .BYTE \$85, 'WIDT', \$C8
1219	08DA	57 49	
1219	08DE	C8	
1220	08DF	D0 08	.WORD L1010 ; LINK TO TIB
1221	08E1	4A 08	WIDTH .WORD DOUSE
1222	08E3	0C	.BYTE \$C
1223	08E4		;
1224	08E4		;
1225	08E4		;
1226	08E4		;
1227	08E4	87	L1026 .BYTE \$87, 'WARNIN', \$C7
1227	08E5	57 41	
1227	08EB	C7	
1228	08EC	D9 08	.WORD L1018 ; LINK TO WIDTH
1229	08EE	4A 08	WARN .WORD DOUSE
1230	08F0	0E	.BYTE \$E
1231	08F1		;
1232	08F1		;
1233	08F1		;
1234	08F1		;
1235	08F1	85	L1034 .BYTE \$85, 'FENC', \$C5
1235	08F2	46 45	
1235	08F6	C5	
1236	08F7	E4 08	.WORD L1026 ; LINK TO WARNING
1237	08F9	4A 08	FENCE .WORD DOUSE
1238	08FB	10	.BYTE \$10
1239	08FC		;

LINE #	LOC	CODE	LINE	
1240	08FC		;	DP
1241	08FC		;	SCREEN 36 LINE 8
1242	08FC		;	
1243	08FC	82	L1042 .BYTE \$82,'D',\$D0	
1243	08FD	44		
1243	08FE	D0		
1244	08FF	F1 08	.WORD L1034	; LINK TO FENCE
1245	0901	4A 08	DP .WORD DOUSE	
1246	0903	12	.BYTE \$12	
1247	0904		;	
1248	0904		;	VOC-LINK
1249	0904		;	SCREEN 36 LINE 9
1250	0904		;	
1251	0904	88	L1050 .BYTE \$88,'VOC-LIN',\$CB	
1251	0905	56 4F		
1251	090C	CB		
1252	090D	FC 08	.WORD L1042	; LINK TO DP
1253	090F	4A 08	VOCL .WORD DOUSE	
1254	0911	14	.BYTE \$14	
1255	0912		;	
1256	0912		;	BLK
1257	0912		;	SCREEN 36 LINE 10
1258	0912		;	
1259	0912	83	L1058 .BYTE \$83,'BL',\$CB	
1259	0913	42 4C		
1259	0915	CB		
1260	0916	04 09	.WORD L1050	; LINK TO VOC-LINK
1261	0918	4A 08	BLK .WORD DOUSE	
1262	091A	16	.BYTE \$16	
1263	091B		;	
1264	091B		;	IN
1265	091B		;	SCREEN 36 LINE 11
1266	091B		;	
1267	091B	82	L1066 .BYTE \$82,'I',\$CE	
1267	091C	49		
1267	091D	CE		
1268	091E	12 09	.WORD L1058	; LINK TO BLK
1269	0920	4A 08	IN .WORD DOUSE	
1270	0922	18	.BYTE \$18	
1271	0923		;	
1272	0923		;	OUT
1273	0923		;	SCREEN 36 LINE 12
1274	0923		;	
1275	0923	83	L1074 .BYTE \$83,'OU',\$D4	
1275	0924	4F 55		
1275	0926	D4		
1276	0927	1B 09	.WORD L1066	; LINK TO IN
1277	0929	4A 08	OUT .WORD DOUSE	
1278	092B	1A	.BYTE \$1A	
1279	092C		;	
1280	092C		;	SCR
1281	092C		;	SCREEN 36 LINE 13
1282	092C		;	
1283	092C	83	L1082 .BYTE \$83,'SC',\$D2	
1283	092D	53 43		

LINE #	LOC	CODE	LINE
1283	092F	D2	
1284	0930	23 09	.WORD L1074 ; LINK TO OUT
1285	0932	4A 08	SCR .WORD DOUSE
1286	0934	1C	.BYTE \$1C
1287	0935		;
1288	0935		;
1289	0935		OFFSET
1290	0935		SCREEN 37 LINE 1
1291	0935		;
1291	0936	86	L1090 .BYTE \$86, 'OFFSE', \$D4
1291	0936	4F 46	
1291	093B	D4	
1292	093C	2C 09	.WORD L1082 ; LINK TO SCR
1293	093E	4A 08	OFSET .WORD DOUSE
1294	0940	1E	.BYTE \$1E
1295	0941		;
1296	0941		;
1297	0941		CONTEXT
1298	0941		SCREEN 37 LINE 2
1299	0941	87	;
1299	0942	43 4F	L1098 .BYTE \$87, 'CONTEX', \$D4
1299	0942	43 4F	
1299	0948	D4	
1300	0949	35 09	.WORD L1090 ; LINK TO OFFSET
1301	094B	4A 08	CON .WORD DOUSE
1302	094D	20	.BYTE \$20
1303	094E		;
1304	094E		;
1305	094E		CURRENT
1306	094E		SCREEN 37 LINE 3
1307	094E	87	;
1307	094F	43 55	L1106 .BYTE \$87, 'CURREN', \$D4
1307	0955	D4	
1308	0956	41 09	.WORD L1098 ; LINK TO CONTEXT
1309	0958	4A 08	CURR .WORD DOUSE
1310	095A	22	.BYTE \$22
1311	095B		;
1312	095B		;
1313	095B		STATE
1314	095B		SCREEN 37 LINE 4
1315	095B	85	;
1315	095C	53 54	L1114 .BYTE \$85, 'STAT', \$C5
1315	0960	C5	
1316	0961	4E 09	.WORD L1106 ; LINK TO CURRENT
1317	0963	4A 08	STATE .WORD DOUSE
1318	0965	24	.BYTE \$24
1319	0966		;
1320	0966		;
1321	0966		BASE
1322	0966		SCREEN 37 LINE 5
1323	0966	84	;
1323	0967	42 41 53	L1122 .BYTE \$84, 'BAS', \$C5
1323	096A	C5	
1324	096B	5B 09	.WORD L1114 ; LINK TO STATE
1325	096D	4A 08	BASE .WORD DOUSE
1326	096F	26	.BYTE \$26
1327	0970		;

LINE #	LOC	CODE	LINE	
1328	0970		;	DPL
1329	0970		;	SCREEN 37 LINE 6
1330	0970		;	
1331	0970	83	L1130 .BYTE \$83,'DP',\$CC	
1331	0971	44 50		
1331	0973	CC		
1332	0974	66 09	.WORD L1122	; LINK TO BASE
1333	0976	4A 08	DPL .WORD DOUSE	
1334	0978	28	.BYTE \$28	
1335	0979		;	
1336	0979		;	FLD
1337	0979		;	SCREEN 37 LINE 7
1338	0979		;	
1339	0979	83	L1138 .BYTE \$83,'FL',\$C4	
1339	097A	46 4C		
1339	097C	C4		
1340	097D	70 09	.WORD L1130	; LINK TO DPL
1341	097F	4A 08	FLD .WORD DOUSE	
1342	0981	2A	.BYTE \$2A	
1343	0982		;	
1344	0982		;	CSP
1345	0982		;	SCREEN 37 LINE 8
1346	0982		;	
1347	0982	83	L1146 .BYTE \$83,'CS',\$D0	
1347	0983	43 53		
1347	0985	D0		
1348	0986	79 09	.WORD L1138	; LINK TO FLD
1349	0988	4A 08	CSP .WORD DOUSE	
1350	098A	2C	.BYTE \$2C	
1351	098B		;	
1352	098B		;	R#
1353	098B		;	SCREEN 37 LINE 9
1354	098B		;	
1355	098B	82	L1154 .BYTE \$82,'R',\$A3	
1355	098C	52		
1355	098D	A3		
1356	098E	82 09	.WORD L1146	; LINK TO CSP
1357	0990	4A 08	RNUM .WORD DOUSE	
1358	0992	2E	.BYTE \$2E	
1359	0993		;	
1360	0993		;	HLD
1361	0993		;	SCREEN 37 LINE 10
1362	0993		;	
1363	0993	83	L1162 .BYTE \$83,'HL',\$C4	
1363	0994	48 4C		
1363	0996	C4		
1364	0997	8B 09	.WORD L1154	; LINK TO R#
1365	0999	4A 08	HLD .WORD DOUSE	
1366	099B	30	.BYTE \$30	
1367	099C		;	
1368	099C		;	1+
1369	099C		;	SCREEN 38 LINE 1
1370	099C		;	
1371	099C	82	L1170 .BYTE \$82,'1',\$AB	
1371	099D	31		

LINE #	LOC	CODE	LINE
1371	099E	AB	
1372	099F	93 09	.WORD L1162 ; LINK TO HLD
1373	09A1	D6 07	ONEP .WORD DOCOL
1374	09A3	65 08	.WORD ONE
1375	09A5	99 06	.WORD PLUS
1376	09A7	0C 06	.WORD SEMIS
1377	09A9	;	
1378	09A9	;	
1379	09A9	;	2+ SCREEN 38 LINE 2
1380	09A9	;	
1381	09A9	82	L1180 .BYTE \$82, '2', \$AB
1381	09AA	32	
1381	09AB	AB	
1382	09AC	9C 09	.WORD L1170 ; LINK TO 1+
1383	09AE	D6 07	TWOP .WORD DOCOL
1384	09B0	6D 08	.WORD TWO
1385	09B2	99 06	.WORD PLUS
1386	09B4	0C 06	.WORD SEMIS
1387	09B6	;	
1388	09B6	;	HERE
1389	09B6	;	SCREEN 38 LINE 3
1390	09B6	;	
1391	09B6	84	L1190 .BYTE \$84, 'HER', \$C5
1391	09B7	48 45 52	
1391	09BA	C5	
1392	09BB	A9 09	.WORD L1180 ; LINK TO 2+
1393	09BD	D6 07	HERE .WORD DOCOL
1394	09BF	01 09	.WORD DP
1395	09C1	79 07	.WORD AT
1396	09C3	0C 06	.WORD SEMIS
1397	09C5	;	
1398	09C5	;	ALLOT
1399	09C5	;	SCREEN 38 LINE 4
1400	09C5	;	
1401	09C5	85	L1200 .BYTE \$85, 'ALLO', \$D4
1401	09C6	41 4C	
1401	09CA	D4	
1402	09CB	B6 09	.WORD L1190 ; LINK TO HERE
1403	09CD	D6 07	ALLOT .WORD DOCOL
1404	09CF	01 09	.WORD DP
1405	09D1	49 07	.WORD PSTOR
1406	09D3	0C 06	.WORD SEMIS
1407	09D5	;	
1408	09D5	;	
1409	09D5	;	, SCREEN 38 LINE 5
1410	09D5	;	
1411	09D5	81	L1210 .BYTE \$81, \$AC
1411	09D6	AC	
1412	09D7	C5 09	.WORD L1200 ; LINK TO ALLOT
1413	09D9	D6 07	COMMA .WORD DOCOL
1414	09DB	BD 09	.WORD HERE
1415	09DD	9D 07	.WORD STORE
1416	09DF	6D 08	.WORD TWO
1417	09E1	CD 09	.WORD ALLOT
1418	09E3	0C 06	.WORD SEMIS

LINE #	LOC	CODE	LINE	
1419	09E5		;	
1420	09E5		;	
1421	09E5		;	C, SCREEN 38 LINE 6
1422	09E5		;	
1423	09E5	82	L1222 .BYTE \$82,'C',\$AC	
1423	09E6	43		
1423	09E7	AC		
1424	09E8	D5 09	.WORD L1210	; LINK TO ,
1425	09EA	D6 07	CCOMM .WORD DOCOL	
1426	09EC	BD 09	.WORD HERE	
1427	09EE	B5 07	.WORD CSTOR	
1428	09F0	65 08	.WORD ONE	
1429	09F2	CD 09	.WORD ALLOT	
1430	09F4	0C 06	.WORD SEMIS	
1431	09F6		;	
1432	09F6		;	
1433	09F6		;	SCREEN 38 LINE 7
1434	09F6		;	
1435	09F6	81	L1234 .BYTE \$81,\$AD	
1435	09F7	AD		
1436	09F8	E5 09	.WORD L1222	; LINK TO C,
1437	09FA	D6 07	SUB .WORD DOCOL	
1438	09FC	D8 06	.WORD MINUS	
1439	09FE	99 06	.WORD PLUS	
1440	0A00	0C 06	.WORD SEMIS	
1441	0A02		;	
1442	0A02		;	=
1443	0A02		;	SCREEN 38 LINE 8
1444	0A02		;	
1445	0A02	81	L1244 .BYTE \$81,\$BD	
1445	0A03	BD		
1446	0A04	F6 09	.WORD L1234	; LINK TO -
1447	0A06	D6 07	EQUAL .WORD DOCOL	
1448	0A08	FA 09	.WORD SUB	
1449	0AOA	73 06	.WORD ZEQU	
1450	0AOB	0C 06	.WORD SEMIS	
1451	0AOE		;	
1452	0AOE		;	U<
1453	0AOE		;	Unsigned less than
1454	0AOE		;	
1455	0AOE	82	L1246 .BYTE \$82,'U',\$BC	
1455	0AOF	55		
1455	0A10	BC		
1456	0A11	02 0A	.WORD L1244	
1457	0A13	D6 07	ULESS .WORD DOCOL	
1458	0A15	FA 09	.WORD SUB	subtract two values
1459	0A17	88 06	.WORD ZLESS	test sign
1460	0A19	0C 06	.WORD SEMIS	
1461	0A1B		;	
1462	0A1B		;	<
1463	0A1B		;	Altered from model
1464	0A1B		;	SCREEN 38 LINE 9
1465	0A1B		;	
1466	0A1B	81	L1254 .BYTE \$81,\$BC	
1466	0A1C	BC		

LINE #	LOC	CODE	LINE
1467	0A1D	0E 0A	.WORD L1246 LINK TO U<
1468	0A1F	21 0A	LESS .WORD *+2
1469	0A21	38	SEC
1470	0A22	B5 02	LDA 2,X
1471	0A24	F5 00	SBC 0,X subtract
1472	0A26	B5 03	LDA 3,X
1473	0A28	F5 01	SBC 1,X
1474	0A2A	94 03	STY 3,X zero hi byte
1475	0A2C	50 02	BVC L1258
1476	0A2E	49 80	EOR #\$80 correct overflow
1477	0A30	10 01	L1258 BPL L1260
1478	0A32	C8	INY invert boolean
1479	0A33	94 02	L1260 STY 2,X leave boolean
1480	0A35	4C EE 03	JMP POP
1481	0A38	;	
1482	0A38	;	>
1483	0A38	;	SCREEN 38 LINE 10
1484	0A38	;	
1485	0A38	81	L1264 .BYTE \$81,\$BE
1485	0A39	BE	
1486	0A3A	1B 0A	.WORD L1254 ; LINK TO <
1487	0A3C	D6 07	GREAT .WORD DOCOL
1488	0A3E	22 07	.WORD SWAP
1489	0A40	1F 0A	.WORD LESS
1490	0A42	0C 06	.WORD SEMIS
1491	0A44	;	
1492	0A44	;	ROT
1493	0A44	;	SCREEN 38 LINE 11
1494	0A44	;	
1495	0A44	83	L1274 .BYTE \$83,'RO',\$D4
1495	0A45	52 4F	
1495	0A47	D4	
1496	0A48	38 0A	.WORD L1264 ; LINK TO >
1497	0A4A	D6 07	ROT .WORD DOCOL
1498	0A4C	3A 06	.WORD TOR
1499	0A4E	22 07	.WORD SWAP
1500	0A50	4C 06	.WORD RFROM
1501	0A52	22 07	.WORD SWAP
1502	0A54	0C 06	.WORD SEMIS
1503	0A56	;	
1504	0A56	;	SPACE
1505	0A56	;	SCREEN 38 LINE 12
1506	0A56	;	
1507	0A56	85	L1286 .BYTE \$85,'SPAC',\$C5
1507	0A57	53 50	
1507	0A5B	C5	
1508	0A5C	44 0A	.WORD L1274 ; LINK TO ROT
1509	0A5E	D6 07	SPACE .WORD DOCOL
1510	0A60	7E 08	.WORD BL
1511	0A62	D7 04	.WORD EMIT
1512	0A64	0C 06	.WORD SEMIS
1513	0A66	;	
1514	0A66	;	-DUP
1515	0A66	;	SCREEN 38 LINE 13
1516	0A66	;	

LINE #	LOC	CODE	LINE
1517	0A66	84	L1296 .BYTE \$84, '-DU', \$D0
1517	0A67	2D 44 55	
1517	0A6A	D0	
1518	0A6B	56 0A	.WORD L1286 ; LINK TO SPACE
1519	0A6D	D6 07	DDUP .WORD DOCOL
1520	0A6F	3A 07	.WORD DUP
1521	0A71	56 03	.WORD ZBRAN
1522	0A73	04 00	L1301 .WORD \$4 L1303-L1301
1523	0A75	3A 07	.WORD DUP
1524	0A77	0C 06	L1303 .WORD SEMIS
1525	0A79	;	
1526	0A79	;	TRAVERSE
1527	0A79	;	SCREEN 39 LINE 14
1528	0A79	;	
1529	0A79	88	L1308 .BYTE \$88, 'TRAVERS', \$C5
1529	0A7A	54 52	
1529	0A81	C5	
1530	0A82	66 0A	.WORD L1296 ; LINK TO -DUP
1531	0A84	D6 07	TRAV .WORD DOCOL
1532	0A86	22 07	.WORD SWAP
1533	0A88	08 07	L1312 .WORD OVER
1534	0A8A	99 06	.WORD PLUS
1535	0A8C	67 02	.WORD CLIT
1536	0A8E	7F	.BYTE \$7F
1537	0A8F	08 07	.WORD OVER
1538	0A91	8E 07	.WORD CAT
1539	0A93	1F 0A	.WORD LESS
1540	0A95	56 03	.WORD ZBRAN
1541	0A97	F1 FF	L1320 .WORD \$FFF1 L1312-L1320
1542	0A99	22 07	.WORD SWAP
1543	0A9B	19 07	.WORD DROP
1544	0A9D	0C 06	.WORD SEMIS
1545	0A9F	;	
1546	0A9F	;	LATEST
1547	0A9F	;	SCREEN 39 LINE 6
1548	0A9F	;	
1549	0A9F	86	L1328 .BYTE \$86, 'LATES', \$D4
1549	OAA0	4C 41	
1549	OAA5	D4	
1550	OAA6	79 0A	.WORD L1308 ; LINK TO TRAVERSE
1551	OAA8	D6 07	LATES .WORD DOCOL
1552	OAAA	58 09	.WORD CURR
1553	OAAC	79 07	.WORD AT
1554	OAAE	79 07	.WORD AT
1555	OAB0	0C 06	.WORD SEMIS
1556	OAB2	;	
1557	OAB2	;	LFA
1558	OAB2	;	SCREEN 39 LINE 11
1559	OAB2	;	
1560	OAB2	83	L1339 .BYTE \$83, 'LF', \$C1
1560	OAB3	4C 46	
1560	OAB5	C1	
1561	OAB6	9F 0A	.WORD L1328 ; LINK TO LATEST
1562	OAB8	D6 07	LFA .WORD DOCOL
1563	OABA	67 02	.WORD CLIT

LINE #	LOC	CODE	LINE
1564	OABC	04	.BYTE 4
1565	OABD	FA 09	.WORD SUB
1566	OABF	OC 06	.WORD SEMIS
1567	OAC1	;	
1568	OAC1	;	
1569	OAC1	;	CFA SCREEN 39 LINE 12
1570	OAC1	;	
1571	OAC1	83	L1350 .BYTE \$83,'CF',\$C1
1571	OAC2	43 46	
1571	OAC4	C1	
1572	OAC5	B2 0A	.WORD L1339 ; LINK TO LFA
1573	OAC7	D6 07	CFA .WORD DOCOL
1574	OAC9	6D 08	.WORD TWO
1575	OACB	FA 09	.WORD SUB
1576	OACD	OC 06	.WORD SEMIS
1577	OACF	;	
1578	OACF	;	
1579	OACF	;	NFA SCREEN 39 LINE 13
1580	OACF	;	
1581	OACF	83	L1360 .BYTE \$83,'NF',\$C1
1581	OADO	4E 46	
1581	OAD2	C1	
1582	OAD3	C1 0A	.WORD L1350 ; LINK TO CFA
1583	OAD5	D6 07	NFA .WORD DOCOL
1584	OAD7	67 02	.WORD CLIT
1585	OAD9	05	.BYTE \$5
1586	OADA	FA 09	.WORD SUB
1587	OADC	2A 02	.WORD LIT,\$FFFF
1587	OADE	FF FF	
1588	OAE0	84 0A	.WORD TRAV
1589	OAE2	OC 06	.WORD SEMIS
1590	OAE4	;	
1591	OAE4	;	PFA
1592	OAE4	;	SCREEN 39 LINE 1
1593	OAE4	;	
1594	OAE4	83	L1373 .BYTE \$83,'PF',\$C1
1594	OAE5	50 46	
1594	OAE7	C1	
1595	OAE8	CF 0A	.WORD L1360 ; LINK TO NFA
1596	OAEA	D6 07	PFA .WORD DOCOL
1597	OAEC	65 08	.WORD ONE
1598	OAEE	84 0A	.WORD TRAV
1599	OAF0	67 02	.WORD CLIT
1600	OAF2	05	.BYTE 5
1601	OAF3	99 06	.WORD PLUS
1602	OAF5	OC 06	.WORD SEMIS
1603	OAF7	;	
1604	OAF7	;	!CSP
1605	OAF7	;	SCREEN 40 LINE 1
1606	OAF7	;	
1607	OAF7	84	L1386 .BYTE \$84,'!CS',\$D0
1607	OAF8	21 43 53	
1607	OAFB	DO	
1608	OAFC	E4 0A	.WORD L1373 ; LINK TO PFA
1609	OAFA	D6 07	SCSP .WORD DOCOL

LINE #	LOC	CODE	LINE
1610	OB00	D9 05	.WORD SPAT
1611	OB02	88 09	.WORD CSP
1612	OB04	9D 07	.WORD STORE
1613	OB06	0C 06	.WORD SEMIS
1614	OB08		;
1615	OB08		;
1616	OB08		;
1617	OB08		;
1618	OB08	86	L1397 .BYTE \$86,'?ERRO',\$D2
1618	OB09	3F 45	
1618	OB0E	D2	
1619	OB0F	F7 0A	.WORD L1386 ; LINK TO !CSP
1620	OB11	D6 07	QERR .WORD DOCOL
1621	OB13	22 07	.WORD SWAP
1622	OB15	56 03	.WORD ZBRAN
1623	OB17	08 00	L1402 .WORD 8 L1406-L1402
1624	OB19	CD 0F	.WORD ERROR
1625	OB1B	37 03	.WORD BRAN
1626	OB1D	04 00	L1405 .WORD 4 L1407-L1405
1627	OB1F	19 07	L1406 .WORD DROP
1628	OB21	OC 06	L1407 .WORD SEMIS
1629	OB23		;
1630	OB23		;
1631	OB23		;
1632	OB23		;
1633	OB23	85	L1412 .BYTE \$85,'?COM',\$D0
1633	OB24	3F 43	
1633	OB28	D0	
1634	OB29	08 0B	.WORD L1397 ; LINK TO ?ERROR
1635	OB2B	D6 07	QCOMP .WORD DOCOL
1636	OB2D	63 09	.WORD STATE
1637	OB2F	79 07	.WORD AT
1638	OB31	73 06	.WORD ZEQU
1639	OB33	67 02	.WORD CLIT
1640	OB35	11	.BYTE \$11
1641	OB36	11 0B	.WORD QERR
1642	OB38	OC 06	.WORD SEMIS
1643	OB3A		;
1644	OB3A		;
1645	OB3A		;
1646	OB3A		;
1647	OB3A	85	L1426 .BYTE \$85,'?EXE',\$C3
1647	OB3B	3F 45	
1647	OB3F	C3	
1648	OB40	23 0B	.WORD L1412 ; LINK TO ?COMP
1649	OB42	D6 07	QEXEC .WORD DOCOL
1650	OB44	63 09	.WORD STATE
1651	OB46	79 07	.WORD AT
1652	OB48	67 02	.WORD CLIT
1653	OB4A	12	.BYTE \$12
1654	OB4B	11 0B	.WORD QERR
1655	OB4D	OC 06	.WORD SEMIS
1656	OB4F		;
1657	OB4F		;
1658	OB4F		;
			?PAIRS
			SCREEN 40 LINE 10

LINE #	LOC	CODE	LINE
1659	OB4F		;
1660	OB4F	86	L1439 .BYTE \$86,'?PAIR',\$D3
1660	OB50	3F 50	
1660	OB55	D3	
1661	OB56	3A 0B	.WORD L1426 ; LINK TO ?EXEC
1662	OB58	D6 07	QPAIR .WORD DOCOL
1663	OB5A	FA 09	.WORD SUB
1664	OB5C	67 02	.WORD CLIT
1665	OB5E	13	.BYTE \$13
1666	OB5F	11 0B	.WORD QERR
1667	OB61	0C 06	.WORD SEMIS
1668	OB63		;
1669	OB63		;
1670	OB63		;
1671	OB63		;
1672	OB63	84	L1451 .BYTE \$84,'?CS',\$D0
1672	OB64	3F 43 53	
1672	OB67	D0	
1673	OB68	4F 0B	.WORD L1439 ; LINK TO ?PAIRS
1674	OB6A	D6 07	QCSP .WORD DOCOL
1675	OB6C	D9 05	.WORD SPAT
1676	OB6E	88 09	.WORD CSP
1677	OB70	79 07	.WORD AT
1678	OB72	FA 09	.WORD SUB
1679	OB74	67 02	.WORD CLIT
1680	OB76	14	.BYTE \$14
1681	OB77	11 0B	.WORD QERR
1682	OB79	0C 06	.WORD SEMIS
1683	OB7B		;
1684	OB7B		;
1685	OB7B		;
1686	OB7B		;
1687	OB7B	88	L1466 .BYTE \$88,'?LOADIN',\$C7
1687	OB7C	3F 4C	
1687	OB83	C7	
1688	OB84	63 0B	.WORD L1451 ; LINK TO ?CSP
1689	OB86	D6 07	QLOAD .WORD DOCOL
1690	OB88	18 09	.WORD BLK
1691	OB8A	79 07	.WORD AT
1692	OB8C	73 06	.WORD ZEQU
1693	OB8E	67 02	.WORD CLIT
1694	OB90	16	.BYTE \$16
1695	OB91	11 0B	.WORD QERR
1696	OB93	0C 06	.WORD SEMIS
1697	OB95		;
1698	OB95		;
1699	OB95		;
1700	OB95		;
1701	OB95	87	L1480 .BYTE \$87,'COMPIL',\$C5
1701	OB96	43 4F	
1701	OB9C	C5	
1702	OB9D	7B 0B	.WORD L1466 ; LINK TO ?LOADING
1703	OB9F	D6 07	COMP .WORD DOCOL
1704	OBA1	2B 0B	.WORD QCOMP
1705	OBA3	4C 06	.WORD RFROM

LINE #	LOC	CODE	LINE	
1706	OBA5	3A 07	.WORD DUP	
1707	OBA7	AE 09	.WORD TWOP	
1708	OBA9	3A 06	.WORD TOR	
1709	OBAB	79 07	.WORD AT	
1710	OBAD	D9 09	.WORD COMMA	
1711	OBAF	OC 06	.WORD SEMIS	
1712	OBBI		;	
1713	OBBI		;	[
1714	OBBI		;	SCREEN 41 LINE 5
1715	OBBI		;	
1716	OBBI	C1	L1495 .BYTE \$C1,\$DB	
1716	OBBI	DB		
1717	OBBI	95 OB	.WORD L1480	; LINK TO COMPILE
1718	OBBI	D6 07	LBRAC .WORD DOCOL	
1719	OBBI	5D 08	.WORD ZERO	
1720	OBBI	63 09	.WORD STATE	
1721	OBBI	9D 07	.WORD STORE	
1722	OBBI	OC 06	.WORD SEMIS	
1723	OBBF		;	
1724	OBBF		;	
1725	OBBF		;]
1726	OBBF		;	SCREEN 41 LINE 7
1727	OBBF		;	
1728	OBBF	81	L1507 .BYTE \$81,\$DD	
1728	OBCO	DD		
1729	OBC1	B1 OB	.WORD L1495	; LINK TO [
1730	OBC3	D6 07	RBRAC .WORD DOCOL	
1731	OBC5	67 02	.WORD CLIT	
1732	OBC7	C0	.BYTE \$C0	
1733	OBC8	63 09	.WORD STATE	
1734	OBCA	9D 07	.WORD STORE	
1735	OBCB	OC 06	.WORD SEMIS	
1736	OBCE		;	
1737	OBCE		;	SMUDGE
1738	OBCE		;	SCREEN 41 LINE 9
1739	OBCE		;	
1740	OBCE	86	L1519 .BYTE \$86,'SMUDG',\$C5	
1740	OBCF	53 4D		
1740	OBD4	C5		
1741	OBD5	BF OB	.WORD L1507	; LINK TO]
1742	OBD7	D6 07	SMUDG .WORD DOCOL	
1743	OBD9	A8 OA	.WORD LATES	
1744	OBDB	67 02	.WORD CLIT	
1745	OBDD	20	.BYTE \$20	
1746	OBDE	6A 07	.WORD TOGGL	
1747	OBE0	OC 06	.WORD SEMIS	
1748	OBE2		;	
1749	OBE2		;	HEX
1750	OBE2		;	SCREEN 41 LINE 11
1751	OBE2		;	
1752	OBE2	83	L1531 .BYTE \$83,'HE',\$D8	
1752	OBE3	48 45		
1752	OBE5	D8		
1753	OBE6	CE OB	.WORD L1519	; LINK TO SMUDGE
1754	OBE8	D6 07	HEX .WORD DOCOL	

LINE #	LOC	CODE	LINE
1755	OBEA	67 02	.WORD CLIT
1756	OBEC	10	.BYTE 16
1757	OBED	6D 09	.WORD BASE
1758	OBEF	9D 07	.WORD STORE
1759	OBF1	0C 06	.WORD SEMIS
1760	OBF3	;	
1761	OBF3	;	
1762	OBF3	;	DECIMAL
1763	OBF3	;	SCREEN 41 LINE 13
1764	OBF3	87	L1543 .BYTE \$87, "DECIMA", \$CC
1764	OBF4	44 45	
1764	OBFA	CC	
1765	OBFB	E2 0B	.WORD L1531 ; LINK TO HEX
1766	OBFD	D6 07	DECIM .WORD DOCOL
1767	OBFF	67 02	.WORD CLIT
1768	OC01	0A	.BYTE 10
1769	OC02	6D 09	.WORD BASE
1770	OC04	9D 07	.WORD STORE
1771	OC06	0C 06	.WORD SEMIS
1772	OC08	;	
1773	OC08	;	(;CODE)
1774	OC08	;	SCREEN 42 LINE 2
1775	OC08	;	
1776	OC08	87	L1555 .BYTE \$87, "(;CODE", \$A9
1776	OC09	28 3B	
1776	OC0F	A9	
1777	OC10	F3 0B	.WORD L1543 ; LINK TO DECIMAL
1778	OC12	D6 07	PSCOD .WORD DOCOL
1779	OC14	4C 06	.WORD RFROM
1780	OC16	A8 0A	.WORD LATES
1781	OC18	EA 0A	.WORD PFA
1782	OC1A	C7 0A	.WORD CFA
1783	OC1C	9D 07	.WORD STORE
1784	OC1E	0C 06	.WORD SEMIS
1785	OC20	;	
1786	OC20	;	;
1787	OC20	;	CODE
1788	OC20	;	SCREEN 42 LINE 6
1789	OC20	C5	L1568 .BYTE \$C5, ";COD", \$C5
1789	OC21	3B 43	
1789	OC25	C5	
1790	OC26	08 0C	.WORD L1555 ; LINK TO (;CODE)
1791	OC28	D6 07	.WORD DOCOL
1792	OC2A	6A 0B	.WORD QCSP
1793	OC2C	9F 0B	.WORD COMP
1794	OC2E	12 0C	.WORD PSCOD
1795	OC30	B5 0B	.WORD LBRAC
1796	OC32	D7 0B	.WORD SMUDG
1797	OC34	0C 06	.WORD SEMIS
1798	OC36	;	
1799	OC36	;	
1800	OC36	;	<BUILD\$
1801	OC36	;	SCREEN 43 LINE 2
1802	OC36	;	
1803	OC36	87	L1582 .BYTE \$87, "<BUILD", \$D3

LINE #	LOC	CODE	LINE	
1803	OC37	3C 42		
1803	OC3D	D3		
1804	OC3E	20 OC	.WORD L1568	; LINK TO ;CODE
1805	OC40	D6 07	BUILD .WORD DOCOL	
1806	OC42	5D 08		.WORD ZERO
1807	OC44	0B 08		.WORD CONST
1808	OC46	OC 06		.WORD SEMIS
1809	OC48		;	
1810	OC48		;	DOES>
1811	OC48		;	SCREEN 43 LINE 4
1812	OC48		;	
1813	OC48	85	L1592 .BYTE \$85,'DOES',\$BE	
1813	OC49	44 4F		
1813	OC4D	BE		
1814	OC4E	36 OC	DOES .WORD L1582	; LINK TO <BUILD\$
1815	OC50	D6 07		.WORD DOCOL
1816	OC52	4C 06		.WORD RFROM
1817	OC54	A8 0A		.WORD LATES
1818	OC56	EA 0A		.WORD PFA
1819	OC58	9D 07		.WORD STORE
1820	OC5A	12 OC		.WORD PSCOD
1821	OC5C		;	
1822	OC5C	A5 AF	DODEE LDA IP+1	
1823	OC5E	48		PHA
1824	OC5F	A5 AE		LDA IP
1825	OC61	48		PHA
1826	OC62	A0 02		LDY #2
1827	OC64	B1 B1		LDA (W),Y
1828	OC66	85 AE		STA IP
1829	OC68	C8		INY
1830	OC69	B1 B1		LDA (W),Y
1831	OC6B	85 AF		STA IP+1
1832	OC6D	18		CLC
1833	OC6E	A5 B1		LDA W
1834	OC70	69 04		ADC #4
1835	OC72	48		PHA
1836	OC73	A5 B2		LDA W+1
1837	OC75	69 00		ADC #0
1838	OC77	4C 3D 02		JMP PUSH
1839	OC7A		;	
1840	OC7A		;	COUNT
1841	OC7A		;	SCREEN 44 LINE 1
1842	OC7A		;	
1843	OC7A	85	L1622 .BYTE \$85,'COUN',\$D4	
1843	OC7B	43 4F		
1843	OC7F	D4		
1844	OC80	48 OC	COUNT .WORD L1592	; LINK TO DOES>
1845	OC82	D6 07		.WORD DOCOL
1846	OC84	3A 07		.WORD DUP
1847	OC86	A1 09		.WORD ONEP
1848	OC88	22 07		.WORD SWAP
1849	OC8A	8E 07		.WORD CAT
1850	OC8C	OC 06		.WORD SEMIS
1851	OC8E		;	
1852	OC8E		;	TYPE

LINE #	LOC	CODE	LINE	
1853	OC8E		;	SCREEN 44 LINE 2
1854	OC8E		;	
1855	OC8E	84	L1634 .BYTE \$84, "TYP", \$C5	
1855	OC8F	54 59 50		
1855	OC92	C5		
1856	OC93	7A OC	.WORD L1622	; LINK TO COUNT
1857	OC95	D6 07	TYPE .WORD DOCOL	
1858	OC97	6D OA	.WORD DDUP	
1859	OC99	56 03	.WORD ZBRAN	
1860	OC9B	18 00	L1639 .WORD \$18	L1651-L1639
1861	OC9D	08 07	.WORD OVER	
1862	OC9F	99 06	.WORD PLUS	
1863	OCA1	22 07	.WORD SWAP	
1864	OCA3	DE 03	.WORD PDO	
1865	OCA5	F7 03	L1644 .WORD I	
1866	OCA7	8E 07	.WORD CAT	
1867	OCA9	D7 04	.WORD EMIT	
1868	OCAB	77 03	.WORD PLOOP	
1869	OCAD	F8 FF	L1648 .WORD \$FFF8	L1644-L1648
1870	OCAF	37 03	.WORD BRAN	
1871	OCB1	04 00	L1650 .WORD \$4	L1652-L1650
1872	OCB3	19 07	L1651 .WORD DROP	
1873	OCB5	OC 06	L1652 .WORD SEMIS	
1874	OCB7		;	
1875	OCB7		;	-TRAILING
1876	OCB7		;	SCREEN 44 LINE 5
1877	OCB7		;	
1878	OCB7	89	L1657 .BYTE \$89, "-TRAILIN", \$C7	
1878	OCB8	2D 54		
1878	OCC0	C7		
1879	OCC1	8E OC	.WORD L1634	; LINK TO TYPE
1880	OCC3	D6 07	DTRAI .WORD DOCOL	
1881	OCC5	3A 07	.WORD DUP	
1882	OCC7	5D 08	.WORD ZERO	
1883	OCC9	DE 03	.WORD PDO	
1884	OCCB	08 07	L1663 .WORD OVER	
1885	OCCD	08 07	.WORD OVER	
1886	OCCF	99 06	.WORD PLUS	
1887	OCD1	65 08	.WORD ONE	
1888	OCD3	FA 09	.WORD SUB	
1889	OCD5	8E 07	.WORD CAT	
1890	OCD7	7E 08	.WORD BL	
1891	OCD9	FA 09	.WORD SUB	
1892	OCDB	56 03	.WORD ZBRAN	
1893	OCDD	08 00	L1672 .WORD 8	L1676-L1672
1894	OCDF	1F 06	.WORD LEAVE	
1895	OCE1	37 03	.WORD BRAN	
1896	OCE3	06 00	L1675 .WORD 6	L1678-L1675
1897	OCE5	65 08	L1676 .WORD ONE	
1898	OCE7	FA 09	.WORD SUB	
1899	OCE9	77 03	L1678 .WORD PLOOP	
1900	OCEB	E0 FF	L1679 .WORD \$FFE0	L1663-L1679
1901	OCED	OC 06	.WORD SEMIS	
1902	OCEF		;	
1903	OCEF		;	(.)

LINE #	LOC	CODE	LINE	
1904	OCEF		;	SCREEN 44 LINE 8
1905	OCEF		;	
1906	OCEF	84	L1685 .BYTE \$84,'(.)', \$A9	
1906	OCFO	28 2E 22		
1906	OCF3	A9		
1907	OCF4	B7 OC	.WORD L1657	; LINK TO -TRAILING
1908	OCF6	D6 07	PDOTQ .WORD DOCOL	
1909	OCF8	5D 06	.WORD R	
1910	OCFA	82 OC	.WORD COUNT	
1911	OCFC	3A 07	.WORD DUP	
1912	OCFE	A1 09	.WORD ONEP	
1913	OD00	4C 06	.WORD RFROM	
1914	OD02	99 06	.WORD PLUS	
1915	OD04	3A 06	.WORD TOR	
1916	OD06	95 OC	.WORD TYPE	
1917	OD08	OC 06	.WORD SEMIS	
1918	ODOA		;	
1919	ODOA		;	."
1920	ODOA		;	SCREEN 44 LINE 12
1921	ODOA		;	
1922	ODOA	C2	L1701 .BYTE \$C2,'.', \$A2	
1922	ODOB	2E		
1922	ODOC	A2		
1923	ODOD	EF OC	.WORD L1685	; LINK TO PDOTQ
1924	ODOF	D6 07	.WORD DOCOL	
1925	OD11	67 02	.WORD CLIT	
1926	OD13	22	.BYTE \$22	
1927	OD14	63 09	.WORD STATE	
1928	OD16	79 07	.WORD AT	
1929	OD18	56 03	.WORD ZBRAN	
1930	OD1A	14 00	L1709 .WORD \$14	L1719-L1709
1931	OD1C	9F 0B	.WORD COMP	
1932	OD1E	F6 OC	.WORD PDOTQ	
1933	OD20	70 0E	.WORD WORD	
1934	OD22	BD 09	.WORD HERE	
1935	OD24	8E 07	.WORD CAT	
1936	OD26	A1 09	.WORD ONEP	
1937	OD28	CD 09	.WORD ALLOT	
1938	OD2A	37 03	.WORD BRAN	
1939	OD2C	0A 00	L1718 .WORD \$A	L1723-L1718
1940	OD2E	70 0E	L1719 .WORD WORD	
1941	OD30	BD 09	.WORD HERE	
1942	OD32	82 OC	.WORD COUNT	
1943	OD34	95 OC	.WORD TYPE	
1944	OD36	OC 06	L1723 .WORD SEMIS	
1945	OD38		;	
1946	OD38		;	
1947	OD38		;	EXPECT
1948	OD38		;	SCREEN 45 LINE 2
1949	OD38		;	
1950	OD38	86	L1729 .BYTE \$86,'EXPEC', \$D4	
1950	OD39	45 58		
1950	OD3E	D4		
1951	OD3F	0A 0D	.WORD L1701	; LINK TO ."
1952	OD41	D6 07	EXPEC .WORD DOCOL	

LINE #	LOC	CODE	LINE	
1953	0D43	08 07	.WORD OVER	
1954	0D45	99 06	.WORD PLUS	
1955	0D47	08 07	.WORD OVER	
1956	0D49	DE 03	.WORD PDO	
1957	0D4B	DF 04	L1736 .WORD KEY	
1958	0D4D	3A 07	.WORD DUP	
1959	0D4F	67 02	.WORD CLIT	
1960	0D51	0E	.BYTE \$E	
1961	0D52	C6 08	.WORD PORIG	
1962	0D54	79 07	.WORD AT	
1963	0D56	06 0A	.WORD EQUAL	
1964	0D58	56 03	.WORD ZBRAN	
1965	0D5A	1F 00	L1744 .WORD \$1F	L1760-L1744
1966	0D5C	19 07	.WORD DROP	
1967	0D5E	67 02	.WORD CLIT	
1968	0D60	08	.BYTE 08	
1969	0D61	08 07	.WORD OVER	
1970	0D63	F7 03	.WORD I	
1971	0D65	06 0A	.WORD EQUAL	
1972	0D67	3A 07	.WORD DUP	
1973	0D69	4C 06	.WORD RFROM	
1974	0D6B	6D 08	.WORD TWO	
1975	0D6D	FA 09	.WORD SUB	
1976	0D6F	99 06	.WORD PLUS	
1977	0D71	3A 06	.WORD TOR	
1978	0D73	FA 09	.WORD SUB	
1979	0D75	37 03	.WORD BRAN	
1980	0D77	27 00	L1759 .WORD \$27	L1779-L1759
1981	0D79	3A 07	L1760 .WORD DUP	
1982	0D7B	67 02	.WORD CLIT	
1983	0D7D	0D	.BYTE \$0D	
1984	0D7E	06 0A	.WORD EQUAL	
1985	0D80	56 03	.WORD ZBRAN	
1986	0D82	0E 00	L1765 .WORD \$0E	L1772-L1765
1987	0D84	1F 06	.WORD LEAVE	
1988	0D86	19 07	.WORD DROP	
1989	0D88	7E 08	.WORD BL	
1990	0D8A	5D 08	.WORD ZERO	
1991	0D8C	37 03	.WORD BRAN	
1992	0D8E	04 00	L1771 .WORD 04	L1773-L1771
1993	0D90	3A 07	L1772 .WORD DUP	
1994	0D92	F7 03	L1773 .WORD I	
1995	0D94	B5 07	.WORD CSTOR	
1996	0D96	5D 08	.WORD ZERO	
1997	0D98	F7 03	.WORD I	
1998	0D9A	A1 09	.WORD ONEP	
1999	0D9C	9D 07	.WORD STORE	
2000	0D9E	D7 04	L1779 .WORD EMIT	
2001	0DA0	77 03	.WORD PLOOP	
2002	0DA2	A9 FF	L1781 .WORD \$FFA9	L1736-L1781
2003	0DA4	19 07	.WORD DROP	
2004	0DA6	0C 06	.WORD SEMIS	
2005	0DA8	;		
2006	0DA8	;		
2007	0DA8	;		

LINE #	LOC	CODE	LINE
2008	ODA8		;
2009	ODA8	85	L1788 .BYTE \$85,'QUER',\$D9
2009	ODA9	51 55	
2009	ODAD	D9	
2010	ODAE	38 0D	.WORD L1729 ; LINK TO EXPECT
2011	ODBO	D6 07	QUERY .WORD DOCOL
2012	ODB2	D6 08	.WORD TIB
2013	ODB4	79 07	.WORD AT
2014	ODB6	67 02	.WORD CLIT
2015	ODB8	50	.BYTE 80 80 characters from terminal
2016	ODB9	41 0D	.WORD EXPEC
2017	DBBB	5D 08	.WORD ZERO
2018	DBBD	20 09	.WORD IN
2019	DBBF	9D 07	.WORD STORE
2020	ODC1	0C 06	.WORD SEMIS
2021	ODC3		;
2022	ODC3		;
2023	ODC3		;
2024	ODC3		;
2025	ODC3	C1	L1804 .BYTE \$C1,\$80
2025	ODC4	80	
2026	ODC5	A8 0D	.WORD L1788 ; LINK TO QUERY
2027	ODC7	D6 07	.WORD DOCOL
2028	ODC9	18 09	.WORD BLK
2029	ODCB	79 07	.WORD AT
2030	ODCD	56 03	.WORD ZBRAN
2031	ODCF	2A 00	L1810 .WORD \$2A L1830-L1810
2032	ODD1	65 08	.WORD ONE
2033	ODD3	18 09	.WORD BLK
2034	ODD5	49 07	.WORD PSTOR
2035	ODD7	5D 08	.WORD ZERO
2036	ODD9	20 09	.WORD IN
2037	ODDB	9D 07	.WORD STORE
2038	ODDD	18 09	.WORD BLK
2039	ODDF	79 07	.WORD AT
2040	ODE1	5D 08	.WORD ZERO,BSCR
2040	ODE3	B8 08	
2041	ODE5	5B 05	.WORD USLAS
2042	ODE7	19 07	.WORD DROP fixed from model
2043	ODE9	73 06	.WORD ZEQU
2044	ODEB	56 03	.WORD ZBRAN
2045	ODED	08 00	L1824 .WORD 8 L1828-L1824
2046	ODEF	42 0B	.WORD QEXEC
2047	ODF1	4C 06	.WORD RFROM
2048	ODF3	19 07	.WORD DROP
2049	ODF5	37 03	L1828 .WORD BRAN
2050	ODF7	06 00	L1829 .WORD 6 L1832-L1829
2051	ODF9	4C 06	L1830 .WORD RFROM
2052	ODFB	19 07	.WORD DROP
2053	ODFD	0C 06	L1832 .WORD SEMIS
2054	ODFF		;
2055	ODFF		;
2056	ODFF		;
2057	ODFF		;
2058	ODFF		;

FILL
SCREEN 46 LINE 1

LINE #	LOC	CODE	LINE
2059	0DFF	84	L1838 .BYTE \$84, 'FIL', \$CC
2059	OE00	46 49 4C	
2059	OE03	CC	
2060	OE04	C3 0D	.WORD L1804 ; LINK TO X
2061	OE06	D6 07	FILL .WORD DOCOL
2062	OE08	22 07	.WORD SWAP
2063	OE0A	3A 06	.WORD TOR
2064	OE0C	08 07	.WORD OVER
2065	OE0E	B5 07	.WORD CSTOR
2066	OE10	3A 07	.WORD DUP
2067	OE12	A1 09	.WORD ONEP
2068	OE14	4C 06	.WORD RFROM
2069	OE16	65 08	.WORD ONE
2070	OE18	FA 09	.WORD SUB
2071	OE1A	FE 04	.WORD CMOVE
2072	OE1C	OC 06	.WORD SEMIS
2073	OE1E	;	
2074	OE1E	;	ERASE
2075	OE1E	;	SCREEN 46 LINE 4
2076	OE1E	;	
2077	OE1E	85	L1856 .BYTE \$85, 'ERAS', \$C5
2077	OE1F	45 52	
2077	OE23	C5	
2078	OE24	FF 0D	.WORD L1838 ; LINK TO FILL
2079	OE26	D6 07	ERASE .WORD DOCOL
2080	OE28	5D 08	.WORD ZERO
2081	OE2A	06 0E	.WORD FILL
2082	OE2C	OC 06	.WORD SEMIS
2083	OE2E	;	
2084	OE2E	;	BLANKS
2085	OE2E	;	SCREEN 46 LINE 7
2086	OE2E	;	
2087	OE2E	86	L1866 .BYTE \$86, 'BLANK', \$D3
2087	OE2F	42 4C	
2087	OE34	D3	
2088	OE35	1E 0E	.WORD L1856 ; LINK TO ERASE
2089	OE37	D6 07	BLANK .WORD DOCOL
2090	OE39	7E 08	.WORD BL
2091	OE3B	06 0E	.WORD FILL
2092	OE3D	OC 06	.WORD SEMIS
2093	OE3F	;	
2094	OE3F	;	
2095	OE3F	;	.FILE FOR3/1
2096	OE3F	;	
2097	OE3F	;	HOLD
2098	OE3F	;	SCREEN 46 LINE 10
2099	OE3F	;	
2100	OE3F	84	L1876 .BYTE \$84, 'HOL', \$C4
2100	OE40	48 4F 4C	
2100	OE43	C4	
2101	OE44	2E 0E	.WORD L1866 ; LINK TO BLANKS
2102	OE46	D6 07	HOLD .WORD DOCOL
2103	OE48	2A 02	.WORD LIT, \$FFFF
2103	OE4A	FF FF	
2104	OE4C	99 09	.WORD HLD

LINE #	LOC	CODE	LINE
2105	OE4E	49 07	.WORD PSTOR
2106	OE50	99 09	.WORD HLD
2107	OE52	79 07	.WORD AT
2108	OE54	B5 07	.WORD CSTOR
2109	OE56	0C 06	.WORD SEMIS
2110	OE58		;
2111	OE58		;
2112	OE58		;
2113	OE58		;
2114	OE58	83	L1890 .BYTE \$83, 'PA', \$C4
2114	OE59	50 41	
2114	OE5B	C4	
2115	OE5C	3F 0E	.WORD L1876 ; LINK TO HOLD
2116	OE5E	D6 07	PAD .WORD DOCOL
2117	OE60	BD 09	.WORD HERE
2118	OE62	67 02	.WORD CLIT
2119	OE64	44	.BYTE 68 PAD is 68 bytes above here.
2120	OE65	99 06	.WORD PLUS
2121	OE67	0C 06	.WORD SEMIS
2122	OE69		;
2123	OE69		;
2124	OE69		;
2125	OE69		;
2126	OE69	84	L1902 .BYTE \$84, 'WOR', \$C4
2126	OE6A	57 4F 52	
2126	OE6D	C4	
2127	OE6E	58 0E	.WORD L1890 ; LINK TO PAD
2128	OE70	D6 07	WORD .WORD DOCOL
2129	OE72	18 09	.WORD BLK
2130	OE74	79 07	.WORD AT
2131	OE76	56 03	.WORD ZBRAN
2132	OE78	0C 00	L1908 .WORD \$C L1914-L1908
2133	OE7A	18 09	.WORD BLK
2134	OE7C	79 07	.WORD AT
2135	OE7E	D5 14	.WORD BLOCK
2136	OE80	37 03	.WORD BRAN
2137	OE82	06 00	L1913 .WORD \$6 L1916-L1913
2138	OE84	D6 08	L1914 .WORD TIB
2139	OE86	79 07	.WORD AT
2140	OE88	20 09	L1916 .WORD IN
2141	OE8A	79 07	.WORD AT
2142	OE8C	99 06	.WORD PLUS
2143	OE8E	22 07	.WORD SWAP
2144	OE90	98 04	.WORD ENCL
2145	OE92	BD 09	.WORD HERE
2146	OE94	67 02	.WORD CLIT
2147	OE96	22	.BYTE \$22
2148	OE97	37 0E	.WORD BLANK
2149	OE99	20 09	.WORD IN
2150	OE9B	49 07	.WORD PSTOR
2151	OE9D	08 07	.WORD OVER
2152	OE9F	FA 09	.WORD SUB
2153	OE A1	3A 06	.WORD TOR
2154	OE A3	5D 06	.WORD R
2155	OE A5	BD 09	.WORD HERE

LINE #	LOC	CODE	LINE
2156	0EA7	B5 07	.WORD CSTOR
2157	0EA9	99 06	.WORD PLUS
2158	0EAB	BD 09	.WORD HERE
2159	0EAD	A1 09	.WORD ONEP
2160	0EAF	4C 06	.WORD RFROM
2161	0EB1	FE 04	.WORD CMOVE
2162	0EB3	OC 06	.WORD SEMIS
2163	0EB5		;
2164	0EB5		;
2165	0EB5		;
2166	0EB5		;
2167	0EB5	85	L1943 .BYTE \$85,'UPPE',\$D2
2167	0EB6	55 50	
2167	0EBA	D2	
2168	0EBB	69 OE	.WORD L1902 ; LINK TO WORD
2169	0EBD	D6 07	UPPER .WORD DOCOL
2170	0EBF	08 07	.WORD OVER
2171	0EC1	99 06	.WORD PLUS
2172	0EC3	22 07	.WORD SWAP
2173	0EC5	DE 03	.WORD PDO
2174	0EC7	F7 03	L1950 .WORD I
2175	0EC9	8E 07	.WORD CAT
2176	0ECB	67 02	.WORD CLIT
2177	0ECD	5F	.BYTE \$5F
2178	0ECE	3C 0A	.WORD GREAT
2179	0ED0	56 03	.WORD ZBRAN
2180	0ED2	09 00	L1956 .WORD 09 L1961-L1956
2181	0ED4	F7 03	.WORD I
2182	0ED6	67 02	.WORD CLIT
2183	0ED8	20	.BYTE \$20
2184	0ED9	6A 07	.WORD TOGGL
2185	0EDB	77 03	L1961 .WORD PLOOP
2186	0EDD	EA FF	L1962 .WORD \$FFEA L1950-L1962
2187	0EDF	OC 06	.WORD SEMIS
2188	0EE1		;
2189	0EE1		;
2190	0EE1		;
2191	0EE1		;
2192	0EE1	88	L1968 .BYTE \$88,'(NUMBER),\$A9
2192	0EE2	28 4E	
2192	0EE9	A9	
2193	0EEA	B5 0E	.WORD L1943 ; LINK TO UPPER
2194	0EEC	D6 07	PNUMB .WORD DOCOL
2195	0EEE	A1 09	L1971 .WORD ONEP
2196	0EFO	3A 07	.WORD DUP
2197	0EF2	3A 06	.WORD TOR
2198	0EF4	8E 07	.WORD CAT
2199	0EF6	6D 09	.WORD BASE
2200	0EF8	79 07	.WORD AT
2201	0EFA	01 04	.WORD DIGIT
2202	0EFC	56 03	.WORD ZBRAN
2203	0EFE	2C 00	L1979 .WORD \$2C L2001-L1979
2204	0F00	22 07	.WORD SWAP
2205	0F02	6D 09	.WORD BASE
2206	0F04	79 07	.WORD AT

LINE #	LOC	CODE	LINE
2207	0F06	23 05	.WORD USTAR
2208	0F08	19 07	.WORD DROP
2209	0FOA	4A 0A	.WORD ROT
2210	0FOC	6D 09	.WORD BASE
2211	0FOE	79 07	.WORD AT
2212	0F10	23 05	.WORD USTAR
2213	0F12	B2 06	.WORD DPLUS
2214	0F14	76 09	.WORD DPL
2215	0F16	79 07	.WORD AT
2216	0F18	A1 09	.WORD ONEP
2217	0F1A	56 03	.WORD ZBRAN
2218	0F1C	08 00	L1994 .WORD 8 L1998-L1994
2219	0F1E	65 08	.WORD ONE
2220	0F20	76 09	.WORD DPL
2221	0F22	49 07	.WORD PSTOR
2222	0F24	4C 06	L1998 .WORD RFROM
2223	0F26	37 03	.WORD BRAN
2224	0F28	C6 FF	L2000 .WORD \$FFC6 L1971-L2000
2225	0F2A	4C 06	L2001 .WORD RFROM
2226	0F2C	0C 06	.WORD SEMIS
2227	0F2E		;
2228	0F2E		;
2229	0F2E		;
2230	0F2E		;
2231	0F2E	86	L2007 .BYTE \$86, "NUMBE", \$D2
2231	0F2F	4E 55	
2231	0F34	D2	
2232	0F35	E1 0E	.WORD L1968 ; LINK TO (NUMBER)
2233	0F37	D6 07	NUMBER .WORD DOCOL
2234	0F39	5D 08	.WORD ZERO
2235	0F3B	5D 08	.WORD ZERO
2236	0F3D	4A 0A	.WORD ROT
2237	0F3F	3A 07	.WORD DUP
2238	0F41	A1 09	.WORD ONEP
2239	0F43	8E 07	.WORD CAT
2240	0F45	67 02	.WORD CLIT
2241	0F47	2D	.BYTE \$2D
2242	0F48	06 0A	.WORD EQUAL
2243	0F4A	3A 07	.WORD DUP
2244	0F4C	3A 06	.WORD TOR
2245	0F4E	99 06	.WORD PLUS
2246	0F50	2A 02	.WORD LIT, \$FFFF
2246	0F52	FF FF	
2247	0F54	76 09	L2023 .WORD DPL
2248	0F56	9D 07	.WORD STORE
2249	0F58	EC 0E	.WORD PNUMB
2250	0F5A	3A 07	.WORD DUP
2251	0F5C	8E 07	.WORD CAT
2252	0F5E	7E 08	.WORD BL
2253	0F60	FA 09	.WORD SUB
2254	0F62	56 03	.WORD ZBRAN
2255	0F64	15 00	L2031 .WORD \$15 L2042-L2031
2256	0F66	3A 07	.WORD DUP
2257	0F68	8E 07	.WORD CAT
2258	0F6A	67 02	.WORD CLIT

LINE #	LOC	CODE	LINE
2259	0F6C	2E	.BYTE \$2E
2260	0F6D	FA 09	.WORD SUB
2261	0F6F	5D 08	.WORD ZERO
2262	0F71	11 0B	.WORD QERR
2263	0F73	5D 08	.WORD ZERO
2264	0F75	37 03	.WORD BRAN
2265	0F77	DD FF	L2041 .WORD \$FFDD
2266	0F79	19 07	L2042 .WORD DROP
2267	0F7B	4C 06	.WORD RFROM
2268	0F7D	56 03	.WORD ZBRAN
2269	0F7F	04 00	L2045 .WORD 4
2270	0F81	F1 06	.WORD DMINU
2271	0F83	0C 06	L2047 .WORD SEMIS
2272	0F85	;	
2273	0F85	;	-FIND
2274	0F85	;	SCREEN 48 LINE 12
2275	0F85	;	
2276	0F85	85	L2052 .BYTE \$85, '-FIN', \$C4
2276	0F86	2D 46	
2276	0F8A	C4	
2277	0F8B	2E OF	.WORD L2007 ; LINK TO NUMBER
2278	0F8D	D6 07	DFIND .WORD DOCOL
2279	0F8F	7E 08	.WORD BL
2280	0F91	70 0E	.WORD WORD
2281	0F93	BD 09	.WORD HERE) Optional allowing free use of low
2282	0F95	82 0C	.WORD COUNT case from terminal.
2283	0F97	BD 0E	.WORD UPPER)
2284	0F99	BD 09	.WORD HERE
2285	0F9B	4B 09	.WORD CON
2286	0F9D	79 07	.WORD AT
2287	0F9F	79 07	.WORD AT
2288	0FA1	32 04	.WORD PFIND
2289	0FA3	3A 07	.WORD DUP
2290	0FA5	73 06	.WORD ZEQU
2291	0FA7	56 03	.WORD ZBRAN
2292	0FA9	0A 00	L2068 .WORD \$A L2073-L2068
2293	0FAB	19 07	.WORD DROP
2294	0FAD	BD 09	.WORD HERE
2295	0FAF	A8 0A	.WORD LATES
2296	0FB1	32 04	.WORD PFIND
2297	0FB3	0C 06	L2073 .WORD SEMIS
2298	0FB5	;	
2299	0FB5	;	(ABORT)
2300	0FB5	;	SCREEN 49 LINE 2
2301	0FB5	;	
2302	0FB5	87	L2078 .BYTE \$87, '(ABORT', \$A9
2302	0FB6	28 41	
2302	0FBC	A9	
2303	0FBD	85 OF	.WORD L2052 ; LINK TO -FIND
2304	0FBF	D6 07	PABOR .WORD DOCOL
2305	0FC1	1D 12	.WORD ABORT
2306	0FC3	0C 06	.WORD SEMIS
2307	0FC5	;	
2308	0FC5	;	ERROR
2309	0FC5	;	SCREEN 49 LINE 4

LINE #	LOC	CODE	LINE
2310	OFC5		;
2311	OFC5	85	L2087 .BYTE \$85,'ERRO',\$D2
2311	OFC6	45 52	
2311	OFCA	D2	
2312	OFCB	B5 OF	
2313	OFCD	D6 07	WORD L2078 ; LINK TO (ABORT)
2314	OFCF	EE 08	WORD DOCOL
2315	OFD1	79 07	WORD WARN
2316	OFD3	88 06	WORD AT
2317	OFD5	56 03	WORD ZLESS
2318	OFD7	04 00	WORD ZBRAN
2319	OFD9	BF OF	L2094 WORD \$4 L2096-L2094
2320	OFDB	BD 09	WORD HERE
2321	OFDD	82 OC	WORD COUNT
2322	OFDF	95 OC	WORD TYPE
2323	OFE1	F6 OC	WORD PDOTQ
2324	OFE3	04	BYTE 4, ' ? '
2324	OFE4	20 20	
2325	OFE8	6C 15	WORD MESS
2326	OFEA	E8 05	WORD SPSTO
2327	OFEF	19 07	WORD DROP, DROP ; make room for 2 error values
2327	OFEE	19 07	
2328	OFF0	20 09	WORD IN
2329	OFF2	79 07	WORD AT
2330	OFF4	18 09	WORD BLK
2331	OFF6	79 07	WORD AT
2332	OFF8	EE 11	WORD QUIT
2333	OFFA	OC 06	WORD SEMIS
2334	OFFC		;
2335	OFFC		;
2336	OFFC		;
2337	OFFC		;
2338	OFFC	83	L2113 .BYTE \$83,'ID',\$AE
2338	OFFD	49 44	
2338	OFFF	AE	
2339	1000	C5 OF	WORD L2087 ; LINK TO ERROR
2340	1002	D6 07	WORD DOCOL
2341	1004	5E 0E	WORD PAD
2342	1006	67 02	WORD CLIT
2343	1008	20	BYTE \$20
2344	1009	67 02	WORD CLIT
2345	100B	5F	BYTE \$5F
2346	100C	06 0E	WORD FILL
2347	100E	3A 07	WORD DUP
2348	1010	EA 0A	WORD PFA
2349	1012	B8 0A	WORD LFA
2350	1014	08 07	WORD OVER
2351	1016	FA 09	WORD SUB
2352	1018	5E 0E	WORD PAD
2353	101A	22 07	WORD SWAP
2354	101C	FE 04	WORD CMOVE
2355	101E	5E 0E	WORD PAD
2356	1020	82 OC	WORD COUNT
2357	1022	67 02	WORD CLIT
2358	1024	1F	BYTE \$1F

LINE #	LOC	CODE	LINE
2359	1025	98 05	.WORD ANDD
2360	1027	95 0C	.WORD TYPE
2361	1029	5E 0A	.WORD SPACE
2362	102B	0C 06	.WORD SEMIS
2363	102D	;	
2364	102D	;	
2365	102D	;	CREATE SCREEN 50 LINE 2
2366	102D	;	
2367	102D	86	L2142 .BYTE \$86,"CREAT",\$C5
2367	102E	43 52	
2367	1033	C5	
2368	1034	FC OF	.WORD L2113 ; LINK TO ID.
2369	1036	D6 07	CREAT .WORD DOCOL
2370	1038	D6 08	.WORD TIB)
2371	103A	BD 09	.WORD HERE 6502 only, assures room exists
2372	103C	67 02	.WORD CLIT in dictionary.
2373	103E	A0	.BYTE \$AO
2374	103F	99 06	.WORD PLUS
2375	1041	13 0A	.WORD ULESS
2376	1043	6D 08	.WORD TWO
2377	1045	11 0B	.WORD QERR)
2378	1047	8D OF	.WORD DFIND
2379	1049	56 03	.WORD ZBRAN
2380	104B	0F 00	L2155 .WORD \$OF L2163-L2155
2381	104D	19 07	.WORD DROP
2382	104F	D5 0A	.WORD NFA
2383	1051	02 10	.WORD IDDOT
2384	1053	67 02	.WORD CLIT
2385	1055	04	.BYTE 4
2386	1056	6C 15	.WORD MESS
2387	1058	5E 0A	.WORD SPACE
2388	105A	BD 09	L2163 .WORD HERE
2389	105C	3A 07	.WORD DUP
2390	105E	8E 07	.WORD CAT
2391	1060	E1 08	.WORD WIDTH
2392	1062	79 07	.WORD AT
2393	1064	D2 12	.WORD MIN
2394	1066	A1 09	.WORD ONEP
2395	1068	CD 09	.WORD ALLOT
2396	106A	01 09	.WORD DP) 6502 only. The code field musn't straddle page boundaries.
2397	106C	8E 07	.WORD CAT
2398	106E	67 02	.WORD CLIT
2399	1070	FD	.BYTE \$FD
2400	1071	06 0A	.WORD EQUAL
2401	1073	CD 09	.WORD ALLOT)
2402	1075	3A 07	.WORD DUP
2403	1077	67 02	.WORD CLIT
2404	1079	A0	.BYTE \$AO
2405	107A	6A 07	.WORD TOGGL
2406	107C	BD 09	.WORD HERE
2407	107E	65 08	.WORD ONE
2408	1080	FA 09	.WORD SUB
2409	1082	67 02	.WORD CLIT
2410	1084	80	.BYTE \$80
2411	1085	6A 07	.WORD TOGGL

LINE #	LOC	CODE	LINE
2412	1087	A8 0A	.WORD LATES
2413	1089	D9 09	.WORD COMMA
2414	108B	58 09	.WORD CURR
2415	108D	79 07	.WORD AT
2416	108F	9D 07	.WORD STORE
2417	1091	BD 09	.WORD HERE
2418	1093	AE 09	.WORD TWOP
2419	1095	D9 09	.WORD COMMA
2420	1097	0C 06	.WORD SEMIS
2421	1099		;
2422	1099		;
2423	1099		[COMPILE]
2424	1099		SCREEN 51 LINE 2
2425	1099	C9	L2200 .BYTE \$C9, '[COMPILE', \$DD
2425	109A	5B 43	
2425	10A2	DD	
2426	10A3	2D 10	.WORD L2142 ; LINK TO CREATE
2427	10A5	D6 07	.WORD DOCOL
2428	10A7	8D 0F	.WORD DFIND
2429	10A9	73 06	.WORD ZEQU
2430	10AB	5D 08	.WORD ZERO
2431	10AD	11 0B	.WORD QERR
2432	10AF	19 07	.WORD DROP
2433	10B1	C7 0A	.WORD CFA
2434	10B3	D9 09	.WORD COMMA
2435	10B5	0C 06	.WORD SEMIS
2436	10B7		;
2437	10B7		;
2438	10B7		;
2439	10B7		LITERAL
2440	10B7		SCREEN 51 LINE 5
2441	10B7	C7	L2216 .BYTE \$C7, 'LITERA', \$CC
2441	10B8	4C 49	
2441	10BE	CC	
2442	10BF	99 10	.WORD L2200 ; LINK TO [COMPILE]
2443	10C1	D6 07	LITER .WORD DOCOL
2444	10C3	63 09	.WORD STATE
2445	10C5	79 07	.WORD AT
2446	10C7	56 03	.WORD ZBRAN
2447	10C9	08 00	L2222 .WORD 8 L2226-L2222
2448	10CB	9F 0B	.WORD COMP
2449	10CD	2A 02	.WORD LIT
2450	10CF	D9 09	.WORD COMMA
2451	10D1	0C 06	L2226 .WORD SEMIS
2452	10D3		;
2453	10D3		;
2454	10D3		;
2455	10D3		DLITERAL
2456	10D3		SCREEN 51 LINE 8
2457	10D3	C8	L2232 .BYTE \$C8, 'DLITERA', \$CC
2457	10D4	44 4C	
2457	10DB	CC	
2458	10DC	B7 10	.WORD L2216 ; LINK TO LITERAL
2459	10DE	D6 07	DLIT .WORD DOCOL
2460	10EO	63 09	.WORD STATE

LINE #	LOC	CODE	LINE
2461	10E2	79 07	.WORD AT
2462	10E4	56 03	.WORD ZBRAN
2463	10E6	08 00	L2238 .WORD 8
2464	10E8	22 07	.WORD SWAP
2465	10EA	C1 10	.WORD LITER
2466	10EC	C1 10	.WORD LITER
2467	10EE	0C 06	L2242 .WORD SEMIS
2468	10F0		;
2469	10F0		;
2470	10F0		;
2471	10F0		?STACK SCREEN 51 LINE 13
2472	10F0		;
2473	10F0	86	L2248 .BYTE \$86, '?STAC', \$CB
2473	10F1	3F 53	
2473	10F6	CB	
2474	10F7	D3 10	.WORD L2232 ; LINK TO DLITERAL
2475	10F9	D6 07	QSTAC .WORD DOCOL
2476	10FB	67 02	.WORD CLIT
2477	10FD	9E	.BYTE TOS
2478	10FE	D9 05	.WORD SPAT
2479	1100	13 0A	.WORD ULESS
2480	1102	65 08	.WORD ONE
2481	1104	11 0B	.WORD QERR
2482	1106	D9 05	.WORD SPAT
2483	1108	67 02	.WORD CLIT
2484	110A	20	.BYTE BOS
2485	110B	13 0A	.WORD ULESS
2486	110D	67 02	.WORD CLIT
2487	110F	07	.BYTE 7
2488	1110	11 0B	.WORD QERR
2489	1112	0C 06	.WORD SEMIS
2490	1114		;
2491	1114		;
2492	1114		INTERPRET SCREEN 52 LINE 2
2493	1114		;
2494	1114	89	L2269 .BYTE \$89, 'INTERPRE', \$D4
2494	1115	49 4E	
2494	111D	D4	
2495	111E	F0 10	.WORD L2248 ; LINK TO ?STACK
2496	1120	D6 07	INTER .WORD DOCOL
2497	1122	8D 0F	L2272 .WORD DFIND
2498	1124	56 03	.WORD ZBRAN
2499	1126	1E 00	L2274 .WORD \$1E L2289-L2274
2500	1128	63 09	.WORD STATE
2501	112A	79 07	.WORD AT
2502	112C	1F 0A	.WORD LESS
2503	112E	56 03	.WORD ZBRAN
2504	1130	0A 00	L2279 .WORD \$A L2284-L2279
2505	1132	C7 0A	.WORD CFA
2506	1134	D9 09	.WORD COMMA
2507	1136	37 03	.WORD BRAN
2508	1138	06 00	L2283 .WORD \$6 L2286-L2283
2509	113A	C7 0A	L2284 .WORD CFA
2510	113C	1F 03	.WORD EXEC
2511	113E	F9 10	L2286 .WORD QSTAC

LINE #	LOC	CODE	LINE
2512	1140	37 03	.WORD BRAN
2513	1142	1C 00	L2288 .WORD \$1C
2514	1144	BD 09	L2289 .WORD HERE
2515	1146	37 0F	.WORD NUMBER
2516	1148	76 09	.WORD DPL
2517	114A	79 07	.WORD AT
2518	114C	A1 09	.WORD ONEP
2519	114E	56 03	.WORD ZBRAN
2520	1150	08 00	L2295 .WORD 8
2521	1152	DE 10	.WORD DLIT
2522	1154	37 03	.WORD BRAN
2523	1156	06 00	L2298 .WORD \$6
2524	1158	19 07	L2299 .WORD DROP
2525	115A	C1 10	.WORD LITER
2526	115C	F9 10	L2301 .WORD QSTAC
2527	115E	37 03	L2302 .WORD BRAN
2528	1160	C2 FF	L2303 .WORD \$FFC2
2529	1162		;
2530	1162		;
2531	1162		;
2532	1162		;
2533	1162		;
2534	1162	89	L2309 .BYTE \$89, 'IMMEDIAT', \$C5
2534	1163	49 4D	
2534	116B	C5	
2535	116C	14 11	.WORD L2269 ; LINK TO INTERPRET
2536	116E	D6 07	.WORD DOCOL
2537	1170	A8 0A	.WORD LATES
2538	1172	67 02	.WORD CLIT
2539	1174	40	.BYTE \$40
2540	1175	6A 07	.WORD TOGGL
2541	1177	0C 06	.WORD SEMIS
2542	1179		;
2543	1179		;
2544	1179		;
2545	1179		;
2546	1179	8A	L2321 .BYTE \$8A, 'VOCABULAR', \$D9
2546	117A	56 4F	
2546	1183	D9	
2547	1184	62 11	.WORD L2309 ; LINK TO IMMEDIATE
2548	1186	D6 07	.WORD DOCOL
2549	1188	40 0C	.WORD BUILD
2550	118A	2A 02	.WORD LIT, \$A081
2550	118C	81 A0	
2551	118E	D9 09	.WORD COMMA
2552	1190	58 09	.WORD CURR
2553	1192	79 07	.WORD AT
2554	1194	C7 0A	.WORD CFA
2555	1196	D9 09	.WORD COMMA
2556	1198	BD 09	.WORD HERE
2557	119A	0F 09	.WORD VOCL
2558	119C	79 07	.WORD AT
2559	119E	D9 09	.WORD COMMA
2560	11A0	0F 09	.WORD VOCL
2561	11A2	9D 07	.WORD STORE

LINE #	LOC	CODE	LINE
2562	11A4	50 0C	.WORD DOES
2563	11A6	AE 09	DOVOC .WORD TWOP
2564	11A8	4B 09	.WORD CON
2565	11AA	9D 07	.WORD STORE
2566	11AC	0C 06	.WORD SEMIS
2567	11AE		;
2568	11AE		;
2569	11AE		FORTH
2570	11AE		SCREEN 53 LINE 9
2571	11AE	C5	L2346 .BYTE \$C5, "FORT", \$C8
2571	11AF	46 4F	
2571	11B3	C8	
2572	11B4	79 11	.WORD L2321 ; LINK TO VOCABULARY
2573	11B6	5C 0C	FORTH .WORD DODOE
2574	11B8	A6 11	.WORD DOVOC
2575	11BA	81 A0	.WORD \$A081
2576	11BC	64 1A	XFOR .WORD NTOP points to top name in FORTH
2577	11BE	00 00	VLO .WORD 0 last vocabulary link ends at zero
2578	11C0		;
2579	11C0		;
2580	11C0		DEFINITIONS
2581	11C0		SCREEN 53 LINE 11
2582	11C0	8B	L2357 .BYTE \$8B, "DEFINITION", \$D3
2582	11C1	44 45	
2582	11CB	D3	
2583	11CC	AE 11	.WORD L2346 ; LINK TO VOCABULARY
2584	11CE	D6 07	DEFIN .WORD DOCOL
2585	11D0	4B 09	.WORD CON
2586	11D2	79 07	.WORD AT
2587	11D4	58 09	.WORD Curr
2588	11D6	9D 07	.WORD STORE
2589	11D8	0C 06	.WORD SEMIS
2590	11DA		;
2591	11DA		;
2592	11DA		SCREEN 53 LINE 14
2593	11DA		(
2594	11DA	C1	L2369 .BYTE \$C1, \$A8
2594	11DB	A8	
2595	11DC	C0 11	.WORD L2357 ; LINK TO DEFINITIONS
2596	11DE	D6 07	.WORD DOCOL
2597	11EO	67 02	.WORD CLIT
2598	11E2	29	.BYTE \$29
2599	11E3	70 0E	.WORD WORD
2600	11E5	0C 06	.WORD SEMIS
2601	11E7		;
2602	11E7		;
2603	11E7		QUIT
2604	11E7		SCREEN 54 LINE 2
2605	11E7		;
2606	11E7	84	L2381 .BYTE \$84, "QUI", \$D4
2606	11E8	51 55 49	
2606	11EB	D4	
2607	11EC	DA 11	.WORD L2369 ; LINK TO (
2608	11EE	D6 07	QUIT .WORD DOCOL
2609	11FO	5D 08	.WORD ZERO

LINE #	LOC	CODE	LINE
2610	11F2	18 09	.WORD BLK
2611	11F4	9D 07	.WORD STORE
2612	11F6	B5 0B	.WORD LBRAC
2613	11F8	F8 05	L2388 .WORD RPSTO
2614	11FA	F4 04	.WORD CR
2615	11FC	B0 0D	.WORD QUERY
2616	11FE	20 11	.WORD INTER
2617	1200	63 09	.WORD STATE
2618	1202	79 07	.WORD AT
2619	1204	73 06	.WORD ZEQU
2620	1206	56 03	.WORD ZBRAN
2621	1208	07 00	L2396 .WORD 7 L2399-L2396
2622	120A	F6 0C	.WORD PDOTQ
2623	120C	02	.BYTE 2,'OK'
2623	120D	4F 4B	
2624	120F	37 03	L2399 .WORD BRAN
2625	1211	E7 FF	L2400 .WORD \$FFE7 L2388-L2400
2626	1213	0C 06	.WORD SEMIS
2627	1215		;
2628	1215		ABORT
2629	1215		SCREEN 54 LINE 7
2630	1215		;
2631	1215	85	L2406 .BYTE \$85,'ABOR',\$D4
2631	1216	41 42	
2631	121A	D4	
2632	121B	E7 11	.WORD L2381 ; LINK TO QUIT
2633	121D	D6 07	ABORT .WORD DOCOL
2634	121F	E8 05	.WORD SPSTO
2635	1221	FD 0B	.WORD DECIM
2636	1223	68 14	.WORD DRO
2637	1225	F4 04	.WORD CR
2638	1227	F6 0C	.WORD PDOTQ
2639	1229	0E	.BYTE 14,'fig-FORTH 1.0'
2639	122A	66 69	
2640	1238	B6 11	.WORD FORTH
2641	123A	CE 11	.WORD DEFIN
2642	123C	EE 11	.WORD QUIT
2643	123E		;
2644	123E		;
2645	123E		COLD
2646	123E		SCREEN 55 LINE 1
2647	123E		;
2648	123E	84	L2423 .BYTE \$84,'COL',\$C4
2648	123F	43 4F 4C	
2648	1242	C4	
2649	1243	15 12	.WORD L2406 ; LINK TO ABORT
2650	1245	47 12	COLD .WORD *+2
2651	1247	AD 0C 02	LDA ORIG+\$0C ; from cold start area
2652	124A	8D BC 11	STA FORTH+6
2653	124D	AD OD 02	LDA ORIG+\$0D
2654	1250	8D BD 11	STA FORTH+7
2655	1253	A0 15	LDY #\$15
2656	1255	D0 02	BNE L2433
2657	1257	A0 OF	WARM LDY #\$0F
2658	1259	AD 10 02	L2433 LDA ORIG+\$10

LINE #	LOC	CODE	LINE
2659	125C	85 B3	STA UP
2660	125E	AD 11 02	LDA ORIG+\$11
2661	1261	85 B4	STA UP+1
2662	1263	B9 0C 02	L2437 LDA ORIG+\$0C,Y
2663	1266	91 B3	STA (UP),Y
2664	1268	88	DEY
2665	1269	10 F8	BPL L2437
2666	126B	A9 12	LDA #>ABORT ; actually #>(ABORT+2)
2667	126D	85 AF	STA IP+1
2668	126F	A9 1F	LDA #<ABORT+2
2669	1271	85 AE	STA IP
2670	1273	D8	CLD
2671	1274	A9 6C	LDA #\$6C
2672	1276	85 B0	STA W-1
2673	1278	4C FA 05	JMP RPSTO+2 And off we go!
2674	127B		;
2675	127B		;
2676	127B		;
2677	127B		;
2678	127B	84	L2453 .BYTE \$84,'S->',\$C4
2678	127C	53 2D 3E	
2678	127F	C4	
2679	1280	3E 12	.WORD L2423 ; LINK TO COLD
2680	1282	D6 07	STOD .WORD DOCOL
2681	1284	3A 07	.WORD DUP
2682	1286	88 06	.WORD ZLESS
2683	1288	D8 06	.WORD MINUS
2684	128A	0C 06	.WORD SEMIS
2685	128C		;
2686	128C		;
2687	128C		;
2688	128C		;
2689	128C	82	L2464 .BYTE \$82,'+',\$AD
2689	128D	2B	
2689	128E	AD	
2690	128F	7B 12	.WORD L2453 ; LINK TO S->D
2691	1291	D6 07	PM .WORD DOCOL
2692	1293	88 06	.WORD ZLESS
2693	1295	56 03	.WORD ZBRAN
2694	1297	04 00	L2469 .WORD 4 L2471-L2469
2695	1299	D8 06	.WORD MINUS
2696	129B	0C 06	L2471 .WORD SEMIS
2697	129D		;
2698	129D		;
2699	129D		;
2700	129D		;
2701	129D	83	L2476 .BYTE \$83,'D+',\$AD
2701	129E	44 2B	
2701	12A0	AD	
2702	12A1	8C 12	.WORD L2464 ; LINK TO +-
2703	12A3	D6 07	DPM .WORD DOCOL
2704	12A5	88 06	.WORD ZLESS
2705	12A7	56 03	.WORD ZBRAN
2706	12A9	04 00	L2481 .WORD 4 L2483-L2481
2707	12AB	F1 06	.WORD DMINU

LINE #	LOC	CODE	LINE	
2708	12AD	0C 06	L2483	.WORD SEMIS
2709	12AF			;
2710	12AF			;
2711	12AF			ABS
2712	12AF			SCREEN 56 LINE 9
2713	12AF	83	L2488	.BYTE \$83,'AB',\$D3
2713	12B0	41 42		
2713	12B2	D3		
2714	12B3	9D 12		.WORD L2476 ; LINK TO D+-
2715	12B5	D6 07	ABS	.WORD DOCOL
2716	12B7	3A 07		.WORD DUP
2717	12B9	91 12		.WORD PM
2718	12BB	0C 06		.WORD SEMIS
2719	12BD			;
2720	12BD			;
2721	12BD			DABS
2722	12BD			SCREEN 56 LINE 10
2723	12BD	84	L2498	.BYTE \$84,'DAB',\$D3
2723	12BE	44 41 42		
2723	12C1	D3		
2724	12C2	AF 12		.WORD L2488 ; LINK TO ABS
2725	12C4	D6 07	DABS	.WORD DOCOL
2726	12C6	3A 07		.WORD DUP
2727	12C8	A3 12		.WORD DPM
2728	12CA	0C 06		.WORD SEMIS
2729	12CC			;
2730	12CC			;
2731	12CC			MIN
2732	12CC			SCREEN 56 LINE 12
2733	12CC	83	L2508	.BYTE \$83,'MI',\$CE
2733	12CD	4D 49		
2733	12CF	CE		
2734	12D0	BD 12		.WORD L2498 ; LINK TO DABS
2735	12D2	D6 07	MIN	.WORD DOCOL
2736	12D4	08 07		.WORD OVER
2737	12D6	08 07		.WORD OVER
2738	12D8	3C 0A		.WORD GREAT
2739	12DA	56 03		.WORD ZBRAN
2740	12DC	04 00	L2515	.WORD 4 L2517-L2515
2741	12DE	22 07		.WORD SWAP
2742	12E0	19 07	L2517	.WORD DROP
2743	12E2	0C 06		.WORD SEMIS
2744	12E4			;
2745	12E4			;
2746	12E4			MAX
2746	12E4			SCREEN 56 LINE 14
2747	12E4			;
2748	12E4	83	L2523	.BYTE \$83,'MA',\$D8
2748	12E5	4D 41		
2748	12E7	D8		
2749	12E8	CC 12		.WORD L2508 ; LINK TO MIN
2750	12EA	D6 07	MAX	.WORD DOCOL
2751	12EC	08 07		.WORD OVER
2752	12EE	08 07		.WORD OVER
2753	12F0	1F 0A		.WORD LESS
2754	12F2	56 03		.WORD ZBRAN

LINE #	LOC	CODE	LINE	
2755	12F4	04 00	L2530	.WORD 4
2756	12F6	22 07		.WORD SWAP
2757	12F8	19 07	L2532	.WORD DROP
2758	12FA	0C 06		.WORD SEMIS
2759	12FC		;	
2760	12FC		;	
2761	12FC		;	M*
2762	12FC		;	SCREEN 57 LINE 1
2763	12FC	82	L2538	.BYTE \$82, "M", \$AA
2763	12FD	4D		
2763	12FE	AA		
2764	12FF	E4 12		.WORD L2523 ; LINK TO MAX
2765	1301	D6 07	MSTAR	.WORD DOCOL
2766	1303	08 07		.WORD OVER
2767	1305	08 07		.WORD OVER
2768	1307	C3 05		.WORD XOR
2769	1309	3A 06		.WORD TOR
2770	130B	B5 12		.WORD ABS
2771	130D	22 07		.WORD SWAP
2772	130F	B5 12		.WORD ABS
2773	1311	23 05		.WORD USTAR
2774	1313	4C 06		.WORD RFROM
2775	1315	A3 12		.WORD DPM
2776	1317	0C 06		.WORD SEMIS
2777	1319		;	
2778	1319		;	
2779	1319		;	M/
2780	1319		;	SCREEN 57 LINE 3
2781	1319	82	L2556	.BYTE \$82, "M", \$AF
2781	131A	4D		
2781	131B	AF		
2782	131C	FC 12		.WORD L2538 ; LINK TO M*
2783	131E	D6 07	MSLAS	.WORD DOCOL
2784	1320	08 07		.WORD OVER
2785	1322	3A 06		.WORD TOR
2786	1324	3A 06		.WORD TOR
2787	1326	C4 12		.WORD DABS
2788	1328	5D 06		.WORD R
2789	132A	B5 12		.WORD ABS
2790	132C	5B 05		.WORD USLAS
2791	132E	4C 06		.WORD RFROM
2792	1330	5D 06		.WORD R
2793	1332	C3 05		.WORD XOR
2794	1334	91 12		.WORD PM
2795	1336	22 07		.WORD SWAP
2796	1338	4C 06		.WORD RFROM
2797	133A	91 12		.WORD PM
2798	133C	22 07		.WORD SWAP
2799	133E	0C 06		.WORD SEMIS
2800	1340		;	
2801	1340		;	*
2802	1340		;	SCREEN 57 LINE 7
2803	1340		;	
2804	1340	81	L2579	.BYTE \$81, \$AA
2804	1341	AA		

LINE #	LOC	CODE	LINE
2805	1342	19 13	.WORD L2556 ; LINK TO M/
2806	1344	D6 07	STAR .WORD DOCOL
2807	1346	23 05	.WORD USTAR
2808	1348	19 07	.WORD DROP
2809	134A	0C 06	.WORD SEMIS
2810	134C		;
2811	134C		;/MOD
2812	134C		SCREEN 57 LINE 8
2813	134C		;
2814	134C	84	L2589 .BYTE \$84,'/MO',\$C4
2814	134D	2F 4D 4F	
2814	1350	C4	
2815	1351	40 13	.WORD L2579 ; LINK TO *
2816	1353	D6 07	SLMOD .WORD DOCOL
2817	1355	3A 06	.WORD TOR
2818	1357	82 12	.WORD STOD
2819	1359	4C 06	.WORD RFROM
2820	135B	1E 13	.WORD MSLAS
2821	135D	0C 06	.WORD SEMIS
2822	135F		;
2823	135F		;/
2824	135F		SCREEN 57 LINE 9
2825	135F		;
2826	135F	81	L2601 .BYTE \$81,\$AF
2826	1360	AF	
2827	1361	4C 13	.WORD L2589 ; LINK TO /MOD
2828	1363	D6 07	SLASH .WORD DOCOL
2829	1365	53 13	.WORD SLMOD
2830	1367	22 07	.WORD SWAP
2831	1369	19 07	.WORD DROP
2832	136B	0C 06	.WORD SEMIS
2833	136D		;
2834	136D		;
2835	136D		MOD
2836	136D		SCREEN 57 LINE 10
2837	136D	83	L2612 .BYTE \$83,'MO',\$C4
2837	136E	4D 4F	
2837	1370	C4	
2838	1371	5F 13	.WORD L2601 ; LINK TO /
2839	1373	D6 07	MOD .WORD DOCOL
2840	1375	53 13	.WORD SLMOD
2841	1377	19 07	.WORD DROP
2842	1379	0C 06	.WORD SEMIS
2843	137B		;
2844	137B		;/MOD
2845	137B		SCREEN 57 LINE 11
2846	137B		;
2847	137B	85	L2622 .BYTE \$85,'*/MO',\$C4
2847	137C	2A 2F	
2847	1380	C4	
2848	1381	6D 13	.WORD L2612 ; LINK TO MOD
2849	1383	D6 07	SSMOD .WORD DOCOL
2850	1385	3A 06	.WORD TOR
2851	1387	01 13	.WORD MSTAR
2852	1389	4C 06	.WORD RFROM

LINE #	LOC	CODE	LINE
2853	138B	1E 13	.WORD MSLAS
2854	138D	0C 06	.WORD SEMIS
2855	138F	;	
2856	138F	;	
2857	138F	;	*/ SCREEN 57 LINE 13
2858	138F	;	
2859	138F	82	L2634 .BYTE \$82, '*' , \$AF
2859	1390	2A	
2859	1391	AF	
2860	1392	7B 13	.WORD L2622 ; LINK TO */MOD
2861	1394	D6 07	SSLAS .WORD DOCOL
2862	1396	83 13	.WORD SSMOD
2863	1398	22 07	.WORD SWAP
2864	139A	19 07	.WORD DROP
2865	139C	0C 06	.WORD SEMIS
2866	139E	;	
2867	139E	;	M/MOD
2868	139E	;	SCREEN 57 LINE 14
2869	139E	;	
2870	139E	85	L2645 .BYTE \$85, 'M/MO' , \$C4
2870	139F	4D 2F	
2870	13A3	C4	
2871	13A4	8F 13	.WORD L2634 ; LINK TO */
2872	13A6	D6 07	MSMOD .WORD DOCOL
2873	13A8	3A 06	.WORD TOR
2874	13AA	5D 08	.WORD ZERO
2875	13AC	5D 06	.WORD R
2876	13AE	5B 05	.WORD USLAS
2877	13B0	4C 06	.WORD RFROM
2878	13B2	22 07	.WORD SWAP
2879	13B4	3A 06	.WORD TOR
2880	13B6	5B 05	.WORD USLAS
2881	13B8	4C 06	.WORD RFROM
2882	13BA	0C 06	.WORD SEMIS
2883	13BC	;	
2884	13BC	;	USE
2885	13BC	;	SCREEN 58 LINE 1
2886	13BC	;	
2887	13BC	83	L2662 .BYTE \$83, 'US' , \$C5
2887	13BD	55 53	
2887	13BF	C5	
2888	13C0	9E 13	.WORD L2645 ; LINK TO M/MOD
2889	13C2	31 08	USE .WORD DOVAR
2890	13C4	60 3B	.WORD DAREA
2891	13C6	;	
2892	13C6	;	PREV
2893	13C6	;	SCREEN 58 LINE 2
2894	13C6	;	
2895	13C6	84	L2670 .BYTE \$84, 'PRE' , \$D6
2895	13C7	50 52 45	
2895	13CA	D6	
2896	13CB	BC 13	.WORD L2662 ; LINK TO USE
2897	13CD	31 08	PREV .WORD DOVAR
2898	13CF	60 3B	.WORD DAREA
2899	13D1	;	

LINE #	LOC	CODE	LINE
2900	13D1		;
2901	13D1		;
2902	13D1		;
2903	13D1	84	L2678 .BYTE \$84, '+BU', \$C6
2903	13D2	2B 42 55	
2903	13D5	C6	
2904	13D6	C6 13	.WORD L2670 ; LINK TO PREV
2905	13D8	D6 07	PBUF .WORD DOCOL
2906	13DA	2A 02	.WORD LIT
2907	13DC	84 00	.WORD SSIZE+4 holds block #, one sector, two nu
2908	13DE	99 06	.WORD PLUS
2909	13E0	3A 07	.WORD DUP
2910	13E2	A0 08	.WORD LIMIT
2911	13E4	06 0A	.WORD EQUAL
2912	13E6	56 03	.WORD ZBRAN
2913	13E8	06 00	L2688 .WORD 6 L2691-L2688
2914	13EA	19 07	.WORD DROP
2915	13EC	94 08	.WORD FIRST
2916	13EE	3A 07	L2691 .WORD DUP
2917	13F0	CD 13	.WORD PREV
2918	13F2	79 07	.WORD AT
2919	13F4	FA 09	.WORD SUB
2920	13F6	0C 06	.WORD SEMIS
2921	13F8		;
2922	13F8		;
2923	13F8		;
2924	13F8		;
2925	13F8	86	L2700 .BYTE \$86, 'UPDAT', \$C5
2925	13F9	55 50	
2925	13FE	C5	
2926	13FF	D1 13	.WORD L2678 ; LINK TO +BUF
2927	1401	D6 07	UPDAT .WORD DOCOL
2928	1403	CD 13	.WORD PREV
2929	1405	79 07	.WORD AT
2930	1407	79 07	.WORD AT
2931	1409	2A 02	.WORD LIT, \$8000
2931	140B	00 80	
2932	140D	AD 05	.WORD OR
2933	140F	CD 13	.WORD PREV
2934	1411	79 07	.WORD AT
2935	1413	9D 07	.WORD STORE
2936	1415	0C 06	.WORD SEMIS
2937	1417		;
2938	1417		;
2939	1417		;
2940	1417	85	L2705 .BYTE \$85, 'FLUS', \$C8
2940	1418	46 4C	
2940	141C	C8	
2941	141D	F8 13	.WORD L2700 ; LINK TO UPDATE
2942	141F	D6 07	.WORD DOCOL
2943	1421	A0 08	.WORD LIMIT, FIRST, SUB
2943	1423	94 08	
2943	1425	FA 09	
2944	1427	AC 08	.WORD BBUF, CLIT
2944	1429	67 02	

LINE #	LOC	CODE	LINE
2945	142B	04	.BYTE 4
2946	142C	99 06	.WORD PLUS,SLASH,ONEP
2946	142E	63 13	
2946	1430	A1 09	
2947	1432	5D 08	.WORD ZERO,PDO
2947	1434	DE 03	
2948	1436	2A 02	L2835 .WORD LIT,\$7FFF,BUFFR
2948	1438	FF 7F	
2948	143A	8D 14	
2949	143C	19 07	.WORD DROP,PLOOP
2949	143E	77 03	
2950	1440	F6 FF	L2839 .WORD \$FFF6 L2835-L2839
2951	1442	0C 06	.WORD SEMIS
2952	1444	;	
2953	1444	;	
2954	1444	;	EMPTY-BUFFERS
2955	1444	;	SCREEN 58 LINE 11
2956	1444	;	
2957	1444	8D	L2716 .BYTE \$8D,'EMPTY-BUFFER',\$D3
2957	1445	45 4D	
2957	1451	D3	
2958	1452	17 14	.WORD L2705 ; LINK TO FLUSH
2959	1454	D6 07	.WORD DOCOL
2960	1456	94 08	.WORD FIRST
2961	1458	A0 08	.WORD LIMIT
2962	145A	08 07	.WORD OVER
2963	145C	FA 09	.WORD SUB
2964	145E	26 0E	.WORD ERASE
2965	1460	0C 06	.WORD SEMIS
2966	1462	;	
2967	1462	;	DRO
2968	1462	;	SCREEN 58 LINE 14
2969	1462	;	
2970	1462	83	L2729 .BYTE \$83,'DR',\$B0
2970	1463	44 52	
2970	1465	B0	
2971	1466	44 14	.WORD L2716 ; LINK TO EMPTY-BUFFERS
2972	1468	D6 07	DRO .WORD DOCOL
2973	146A	5D 08	.WORD ZERO
2974	146C	3E 09	.WORD OFSET
2975	146E	9D 07	.WORD STORE
2976	1470	0C 06	.WORD SEMIS
2977	1472	;	
2978	1472	;	DR1
2979	1472	;	SCREEN 58 LINE 15
2980	1472	;	
2981	1472	83	L2740 .BYTE \$83,'DR',\$B1
2981	1473	44 52	
2981	1475	B1	
2982	1476	62 14	.WORD L2729 ; LINK TO DRO
2983	1478	D6 07	.WORD DOCOL
2984	147A	2A 02	.WORD LIT,SECTR sectors per drive
2984	147C	20 03	
2985	147E	3E 09	.WORD OFSET
2986	1480	9D 07	.WORD STORE

LINE #	LOC	CODE	LINE
2987	1482	0C 06	.WORD SEMIS
2988	1484		;
2989	1484		;
2990	1484		;
2991	1484		;
2992	1484	86	L2751 .BYTE \$86, "BUFFE", \$D2
2992	1485	42 55	
2992	148A	D2	
2993	148B	72 14	.WORD L2740 ; LINK TO DR1
2994	148D	D6 07	BUFFR .WORD DOCOL
2995	148F	C2 13	.WORD USE
2996	1491	79 07	.WORD AT
2997	1493	3A 07	.WORD DUP
2998	1495	3A 06	.WORD TOR
2999	1497	D8 13	L2758 .WORD PBUF
3000	1499	56 03	.WORD ZBRAN
3001	149B	FC FF	L2760 .WORD \$FFFC L2758-L2760
3002	149D	C2 13	.WORD USE
3003	149F	9D 07	.WORD STORE
3004	14A1	5D 06	.WORD R
3005	14A3	79 07	.WORD AT
3006	14A5	88 06	.WORD ZLESS
3007	14A7	56 03	.WORD ZBRAN
3008	14A9	14 00	L2767 .WORD \$14 L2776-L2767
3009	14AB	5D 06	.WORD R
3010	14AD	AE 09	.WORD TWOP
3011	14AF	5D 06	.WORD R
3012	14B1	79 07	.WORD AT
3013	14B3	2A 02	.WORD LIT, \$7FFF
3013	14B5	FF 7F	
3014	14B7	98 05	.WORD ANDD
3015	14B9	5D 08	.WORD ZERO
3016	14BB	89 16	.WORD RSLW
3017	14BD	5D 06	L2776 .WORD R
3018	14BF	9D 07	.WORD STORE
3019	14C1	5D 06	.WORD R
3020	14C3	CD 13	.WORD PREV
3021	14C5	9D 07	.WORD STORE
3022	14C7	4C 06	.WORD RFROM
3023	14C9	AE 09	.WORD TWOP
3024	14CB	0C 06	.WORD SEMIS
3025	14CD		:
3026	14CD		:
3027	14CD		;
3028	14CD		;
3029	14CD	85	L2788 .BYTE \$85, "BLOC", \$CB
3029	14CE	42 4C	
3029	14D2	CB	
3030	14D3	84 14	.WORD L2751 ; LINK TO BUFFER
3031	14D5	D6 07	BLOCK .WORD DOCOL
3032	14D7	3E 09	.WORD OFSET
3033	14D9	79 07	.WORD AT
3034	14DB	99 06	.WORD PLUS
3035	14DD	3A 06	.WORD TOR
3036	14DF	CD 13	.WORD PREV

LINE #	LOC	CODE	LINE
3037	14E1	79 07	.WORD AT
3038	14E3	3A 07	.WORD DUP
3039	14E5	79 07	.WORD AT
3040	14E7	5D 06	.WORD R
3041	14E9	FA 09	.WORD SUB
3042	14EB	3A 07	.WORD DUP
3043	14ED	99 06	.WORD PLUS
3044	14EF	56 03	.WORD ZBRAN
3045	14F1	34 00	L2804 .WORD \$34
3046	14F3	D8 13	L2805 .WORD PBUF
3047	14F5	73 06	.WORD ZEQU
3048	14F7	56 03	.WORD ZBRAN
3049	14F9	14 00	L2808 .WORD \$14
3050	14FB	19 07	.WORD DROP
3051	14FD	5D 06	.WORD R
3052	14FF	8D 14	.WORD BUFFR
3053	1501	3A 07	.WORD DUP
3054	1503	5D 06	.WORD R
3055	1505	65 08	.WORD ONE
3056	1507	89 16	.WORD RSLW
3057	1509	6D 08	.WORD TWO
3058	150B	FA 09	.WORD SUB
3059	150D	3A 07	L2818 .WORD DUP
3060	150F	79 07	.WORD AT
3061	1511	5D 06	.WORD R
3062	1513	FA 09	.WORD SUB
3063	1515	3A 07	.WORD DUP
3064	1517	99 06	.WORD PLUS
3065	1519	73 06	.WORD ZEQU
3066	151B	56 03	.WORD ZBRAN
3067	151D	D6 FF	L2826 .WORD \$FFD6
3068	151F	3A 07	.WORD DUP
3069	1521	CD 13	.WORD PREV
3070	1523	9D 07	.WORD STORE
3071	1525	4C 06	L2830 .WORD RFROM
3072	1527	19 07	.WORD DROP
3073	1529	AE 09	.WORD TWOP
3074	152B	0C 06	.WORD SEMIS ; END OF BLOCK
3075	152D		;
3076	152D		;
3077	152D		.FILE FOR4/2
3078	152D		; START OF FORTH4
3079	152D		;
3080	152D		;
3081	152D		;
3082	152D		;
3083	152D		;
3084	152D		;
3085	152D	86	L2838 .BYTE \$86, '(LINE', \$A9
3085	152E	28 4C	
3085	1533	A9	
3086	1534	CD 14	.WORD L2788 ; LINK TO BLOCK
3087	1536	D6 07	PLINE .WORD DOCOL
3088	1538	3A 06	.WORD TOR
3089	153A	88 08	.WORD CSLL

(LINE)
SCREEN 61 LINE 2

LINE #	LOC	CODE	LINE
3090	153C	AC 08	.WORD BBUF
3091	153E	83 13	.WORD SSMOD
3092	1540	4C 06	.WORD RFROM
3093	1542	B8 08	.WORD BSCR
3094	1544	44 13	.WORD STAR
3095	1546	99 06	.WORD PLUS
3096	1548	D5 14	.WORD BLOCK
3097	154A	99 06	.WORD PLUS
3098	154C	88 08	.WORD CSLL
3099	154E	0C 06	.WORD SEMIS
3100	1550		;
3101	1550		;
3102	1550		;
3103	1550		;
3104	1550	85	L2857 .BYTE \$85, ".LIN", \$C5
3104	1551	2E 4C	
3104	1555	C5	
3105	1556	2D 15	.WORD L2838 ; LINK TO (LINE)
3106	1558	D6 07	DLINE .WORD DOCOL
3107	155A	36 15	.WORD PLINE
3108	155C	C3 0C	.WORD DTRAI
3109	155E	95 0C	.WORD TYPE
3110	1560	0C 06	.WORD SEMIS
3111	1562		;
3112	1562		;
3113	1562		;
3114	1562		;
3115	1562	87	L2868 .BYTE \$87, "MESSAG", \$C5
3115	1563	4D 45	
3115	1569	C5	
3116	156A	50 15	.WORD L2857 ; LINK TO .LINE
3117	156C	D6 07	MESS .WORD DOCOL
3118	156E	EE 08	.WORD WARN
3119	1570	79 07	.WORD AT
3120	1572	56 03	.WORD ZBRAN
3121	1574	1B 00	L2874 .WORD \$1B L2888-L2874
3122	1576	6D 0A	.WORD DDUP
3123	1578	56 03	.WORD ZBRAN
3124	157A	11 00	L2877 .WORD \$11 L2886-L2877
3125	157C	67 02	.WORD CLIT
3126	157E	04	.BYTE 4
3127	157F	3E 09	.WORD OFSET
3128	1581	79 07	.WORD AT
3129	1583	B8 08	.WORD BSCR
3130	1585	63 13	.WORD SLASH
3131	1587	FA 09	.WORD SUB
3132	1589	58 15	.WORD DLINE
3133	158B	37 03	L2886 .WORD BRAN
3134	158D	0D 00	L2887 .WORD 13 L2891-L2887
3135	158F	F6 0C	L2888 .WORD PDOTQ
3136	1591	06	.BYTE 6, "MSG # "
3136	1592	4D 53	
3137	1598	5D 19	.WORD DOT
3138	159A	0C 06	L2891 .WORD SEMIS
3139	159C		;

LINE #	LOC	CODE	LINE
3140	159C	;	
3141	159C	;	
3142	159C	;	
3143	159C	84	L2896 .BYTE \$84, "LOA", \$C4
3143	159D	4C 4F 41	
3143	15A0	C4	
3144	15A1	62 15	.WORD L2868 ; LINK TO MESSAGE
3145	15A3	D6 07	LOAD .WORD DOCOL
3146	15A5	18 09	.WORD BLK
3147	15A7	79 07	.WORD AT
3148	15A9	3A 06	.WORD TOR
3149	15AB	20 09	.WORD IN
3150	15AD	79 07	.WORD AT
3151	15AF	3A 06	.WORD TOR
3152	15B1	5D 08	.WORD ZERO
3153	15B3	20 09	.WORD IN
3154	15B5	9D 07	.WORD STORE
3155	15B7	B8 08	.WORD BSCR
3156	15B9	44 13	.WORD STAR
3157	15BB	18 09	.WORD BLK
3158	15BD	9D 07	.WORD STORE
3159	15BF	20 11	.WORD INTER
3160	15C1	4C 06	.WORD RFROM
3161	15C3	20 09	.WORD IN
3162	15C5	9D 07	.WORD STORE
3163	15C7	4C 06	.WORD RFROM
3164	15C9	18 09	.WORD BLK
3165	15CB	9D 07	.WORD STORE
3166	15CD	0C 06	.WORD SEMIS
3167	15CF	;	
3168	15CF	;	
3169	15CF	;	---> SCREEN 62 LINE 6
3170	15CF	;	
3171	15CF	C3	L2924 .BYTE \$C3, "--", \$BE
3171	15D0	2D 2D	
3171	15D2	BE	
3172	15D3	9C 15	.WORD L2896 ; LINK TO LOAD
3173	15D5	D6 07	.WORD DOCOL
3174	15D7	86 0B	.WORD QLOAD
3175	15D9	5D 08	.WORD ZERO
3176	15DB	20 09	.WORD IN
3177	15DD	9D 07	.WORD STORE
3178	15DF	B8 08	.WORD BSCR
3179	15E1	18 09	.WORD BLK
3180	15E3	79 07	.WORD AT
3181	15E5	08 07	.WORD OVER
3182	15E7	73 13	.WORD MOD
3183	15E9	FA 09	.WORD SUB
3184	15EB	18 09	.WORD BLK
3185	15ED	49 07	.WORD PSTOR
3186	15EF	0C 06	.WORD SEMIS
3187	15F1	;	
3188	15F1	;	XEMIT writes one ascii character to terminal
3189	15F1	;	
3190	15F1	98	XEMIT TYA

LINE #	LOC	CODE	LINE
3191	15F2	38	SEC
3192	15F3	A0 1A	LDY #\$1A
3193	15F5	71 B3	ADC (UP),Y
3194	15F7	91 B3	STA (UP),Y
3195	15F9	C8	INY ; bump user variable OUT
3196	15FA	A9 00	LDA #0
3197	15FC	71 B3	ADC (UP),Y
3198	15FE	91 B3	STA (UP),Y
3199	1600	B5 00	LDA 0,X ; fetch character to output
3200	1602	86 B5	STX XSAVE
3201	1604	20 C1 D2	JSR OUTCH ; and display it
3202	1607	A6 B5	LDX XSAVE
3203	1609	4C EE 03	JMP POP
3204	160C		;
3205	160C		;; XKEY reads one terminal keystroke to stack
3206	160C		;
3207	160C	86 B5	XKEY STX XSAVE
3208	160E	20 DC D1	JSR INCH ; might otherwise clobber it while
3209	1611	A6 B5	LDX XSAVE ; inputting a character to accumulator.
3210	1613	4C DC 05	JMP PUSHOA
3211	1616		;
3212	1616		;; XQTER leaves a boolean representing terminal break
3213	1616		;
3214	1616	AD 00 C0	XQTER LDA \$C000 ; System dependent port test
3215	1619	CD 01 C0	CMP \$C001
3216	161C	29 01	AND #1
3217	161E	4C DC 05	JMP PUSHOA
3218	1621		;
3219	1621		;; XCR displays a CR and LF to terminal
3220	1621		;
3221	1621	86 B5	XCR STX XSAVE
3222	1623	20 F1 D0	JSR TCR ; Use monitor call
3223	1626	A6 B5	LDX XSAVE
3224	1628	4C 44 02	JMP NEXT
3225	162B		;
3226	162B		;-DISC
3227	162B		Machine level sector read/write
3228	162B	85	L3030 .BYTE \$85, '-DIS', \$C3
3228	162C	2D 44	
3228	1630	C3	
3229	1631	CF 15	.WORD L2924 ; Link to -->
3230	1633	35 16	DDISC .WORD *+2
3231	1635	B5 00	LDA 0,X
3232	1637	8D 0C C6	STA \$C60C
3233	163A	8D 0D C6	STA \$C60D ; Store sector number
3234	163D	B5 02	LDA 2,X
3235	163F	8D 0A C6	STA \$C60A
3236	1642	8D 0B C6	STA \$C60B ; Store track number
3237	1645	B5 04	LDA 4,X
3238	1647	8D CD C4	STA \$C4CD
3239	164A	8D CE C4	STA \$C4CE ; Store drive number
3240	164D	86 B5	STX XSAVE
3241	164F	AD DA C4	LDA \$C4DA ; Sense read or write
3242	1652	D0 06	BNE L3032
3243	1654	20 FE E1	JSR \$E1FE

LINE #	LOC	CODE	LINE
3244	1657	4C 5D 16	JMP L3040
3245	165A	20 62 E2	L3032 JSR \$E262
3246	165D	20 EF E3	L3040 JSR \$E3EF ; Head up motor off
3247	1660	A6 B5	LDX XSAVE
3248	1662	AD E1 C4	LDA \$C4E1 ; Report error code
3249	1665	95 04	STA 4,X
3250	1667	4C EC 03	JMP POPTWO
3251	166A		;
3252	166A		;
3253	166A		;
3254	166A		;
3255	166A	84	L3050 .BYTE \$84, '-BC', \$C4
3255	166B	2D 42 43	
3255	166E	C4	
3256	166F	2B 16	.WORD L3030 ; link to -DISC
3257	1671	D6 07	DBCD .WORD DOCOL
3258	1673	5D 08	.WORD ZERO,CLIT
3258	1675	67 02	
3259	1677	0A	.BYTE 10
3260	1678	5B 05	.WORD USLAS,CLIT
3260	167A	67 02	
3261	167C	10	.BYTE 16
3262	167D	44 13	.WORD STAR,OR,SEMIS
3262	167F	AD 05	
3262	1681	0C 06	
3263	1683		;
3264	1683		;
3265	1683		;
3266	1683	83	L3060 .BYTE \$83, 'R/', \$D7
3266	1684	52 2F	
3266	1686	D7	
3267	1687	6A 16	.WORD L3050 ; link to -BCD
3268	1689	D6 07	RSLW .WORD DOCOL
3269	168B	73 06	.WORD ZEQU,LIT,\$C4DA,CSTOR
3269	168D	2A 02	
3269	168F	DA C4	
3269	1691	B5 07	
3270	1693	22 07	.WORD SWAP,ZERO,STORE
3270	1695	5D 08	
3270	1697	9D 07	
3271	1699	5D 08	.WORD ZERO,OVER,GREAT,OVER
3271	169B	08 07	
3271	169D	3C 0A	
3271	169F	08 07	
3272	16A1	2A 02	.WORD LIT,SECTL-1,GREAT,OR,CLIT
3272	16A3	3F 06	
3272	16A5	3C 0A	
3272	16A7	AD 05	
3272	16A9	67 02	
3273	16AB	06	.BYTE 6
3274	16AC	11 0B	.WORD QERR
3275	16AE	5D 08	.WORD ZERO,LIT,SECTR,USLAS,ONEP
3275	16B0	2A 02	
3275	16B2	20 03	
3275	16B4	5B 05	

LINE #	LOC	CODE	LINE
3275	16B6	A1 09	
3276	16B8	22 07	.WORD SWAP,ZERO,CLIT
3276	16BA	5D 08	
3276	16BC	67 02	
3277	16BE	12	.BYTE \$12
3278	16BF	5B 05	.WORD USLAS,DBCD,SWAP,ONEP
3278	16C1	71 16	
3278	16C3	22 07	
3278	16C5	A1 09	
3279	16C7	71 16	.WORD DBCD,DDISC,CLIT
3279	16C9	33 16	
3279	16CB	67 02	
3280	16CD	08	.BYTE 8
3281	16CE	11 0B	.WORD QERR
3282	16D0	0C 06	.WORD SEMIS
3283	16D2		;
3284	16D2		;
3285	16D2		;
3286	16D2	0C 06	.WORD SEMIS
3287	16D4		;
3288	16D4		;
3289	16D4		;
3290	16D4		SCREEN 72 LINE 2
3291	16D4	C1	L3202 .BYTE \$C1,\$A7
3291	16D5	A7	
3292	16D6	83 16	.WORD L3060 ; LINK TO R/W
3293	16D8	D6 07	TICK .WORD DOCOL
3294	16DA	8D 0F	.WORD DFIND
3295	16DC	73 06	.WORD ZEQU
3296	16DE	5D 08	.WORD ZERO
3297	16E0	11 0B	.WORD QERR
3298	16E2	19 07	.WORD DROP
3299	16E4	C1 10	.WORD LITER
3300	16E6	0C 06	.WORD SEMIS
3301	16E8		;
3302	16E8		;
3303	16E8		FORGET
3304	16E8		Altered from Model
3305	16E8		SCREEN 72 LINE 6
3306	16E8		;
3307	16E8	86	L3217 .BYTE \$86,'FORGE',\$D4
3307	16E9	46 4F	
3307	16EE	D4	
3308	16EF	D4 16	.WORD L3202 LINK TO ' TICK
3309	16F1	D6 07	FORG .WORD DOCOL
3310	16F3	D8 16	.WORD TICK,NFA,DUP
3310	16F5	D5 0A	
3310	16F7	3A 07	
3311	16F9	F9 08	.WORD FENCE,AT,ULESS,CLIT
3311	16FB	79 07	
3311	16FD	13 0A	
3311	16FF	67 02	
3312	1701	15	.BYTE \$15
3313	1702	11 0B	.WORD QERR,TOR,VOCL,AT
3313	1704	3A 06	

LINE #	LOC	CODE	LINE
3313	1706	0F 09	
3313	1708	79 07	
3314	170A	5D 06	L3220 .WORD R,OVER,ULESS
3314	170C	08 07	
3314	170E	13 0A	
3315	1710	56 03	.WORD ZBRAN,L3225-*
3315	1712	12 00	
3316	1714	B6 11	.WORD FORTH,DEFIN,AT,DUP
3316	1716	CE 11	
3316	1718	79 07	
3316	171A	3A 07	
3317	171C	0F 09	.WORD VOCL,STORE
3317	171E	9D 07	
3318	1720	37 03	.WORD BRAN,\$FFFF-24+1 L3220-*
3318	1722	E8 FF	
3319	1724	3A 07	L3225 .WORD DUP,CLIT
3319	1726	67 02	
3320	1728	04	.BYTE 4
3321	1729	FA 09	.WORD SUB
3322	172B	EA 0A	L3228 .WORD PFA,LFA,AT
3322	172D	B8 0A	
3322	172F	79 07	
3323	1731	3A 07	.WORD DUP,R,ULESS
3323	1733	5D 06	
3323	1735	13 0A	
3324	1737	56 03	.WORD ZBRAN,\$FFFF-14+1 L3228-*
3324	1739	F2 FF	
3325	173B	08 07	.WORD OVER,TWO,SUB,STORE
3325	173D	6D 08	
3325	173F	FA 09	
3325	1741	9D 07	
3326	1743	79 07	.WORD AT,DDUP,ZEQU
3326	1745	6D 0A	
3326	1747	73 06	
3327	1749	56 03	.WORD ZBRAN,\$FFFF-39+1 L3225-*
3327	174B	D9 FF	
3328	174D	4C 06	.WORD RFROM,DP,STORE
3328	174F	01 09	
3328	1751	9D 07	
3329	1753	0C 06	.WORD SEMIS
3330	1755		;
3331	1755		;
3332	1755		;
3333	1755		;
3334	1755	84	L3250 .BYTE \$84,'BAC',\$CB
3334	1756	42 41 43	
3334	1759	CB	
3335	175A	E8 16	.WORD L3217 ; LINK TO FORGET
3336	175C	D6 07	BACK .WORD DOCOL
3337	175E	BD 09	.WORD HERE
3338	1760	FA 09	.WORD SUB
3339	1762	D9 09	.WORD COMMA
3340	1764	0C 06	.WORD SEMIS
3341	1766		;
3342	1766		BEGIN

LINE #	LOC	CODE	LINE	
3343	1766		;	SCREEN 73 LINE 3
3344	1766		;	
3345	1766	C5	L3261 .BYTE \$C5,"BEGI",\$CE	
3345	1767	42 45		
3345	176B	CE		
3346	176C	55 17	.WORD L3250	; LINK TO BACK
3347	176E	D6 07	.WORD DOCOL	
3348	1770	2B 0B	.WORD QCOMP	
3349	1772	BD 09	.WORD HERE	
3350	1774	65 08	.WORD ONE	
3351	1776	0C 06	.WORD SEMIS	
3352	1778		;	
3353	1778		;	
3354	1778		;	ENDIF
3355	1778		;	SCREEN 73 LINE 5
3356	1778		;	
3357	1778	C5	L3273 .BYTE \$C5,"ENDI",\$C6	
3357	1779	45 4E		
3357	177D	C6		
3358	177E	66 17	.WORD L3261	; LINK TO BEGIN
3359	1780	D6 07	ENDIF .WORD DOCOL	
3360	1782	2B 0B	.WORD QCOMP	
3361	1784	6D 08	.WORD TWO	
3362	1786	58 0B	.WORD QPAIR	
3363	1788	BD 09	.WORD HERE	
3364	178A	08 07	.WORD OVER	
3365	178C	FA 09	.WORD SUB	
3366	178E	22 07	.WORD SWAP	
3367	1790	9D 07	.WORD STORE	
3368	1792	0C 06	.WORD SEMIS	
3369	1794		;	
3370	1794		;	
3371	1794		;	THEN
3372	1794		;	SCREEN 73 LINE 7
3373	1794		;	
3374	1794	C4	L3290 .BYTE \$C4,"THE",\$CE	
3374	1795	54 48 45		
3374	1798	CE		
3375	1799	78 17	.WORD L3273	; LINK TO ENDIF
3376	179B	D6 07	.WORD DOCOL	
3377	179D	80 17	.WORD ENDIF	
3378	179F	0C 06	.WORD SEMIS	
3379	17A1		;	
3380	17A1		;	
3381	17A1		;	DO
3382	17A1		;	SCREEN 73 LINE 9
3383	17A1		;	
3384	17A1	C2	L3300 .BYTE \$C2,"D",\$CF	
3384	17A2	44		
3384	17A3	CF		
3385	17A4	94 17	.WORD L3290	; LINK TO THEN
3386	17A6	D6 07	.WORD DOCOL	
3387	17A8	9F 0B	.WORD COMP	
3388	17AA	DE 03	.WORD PDO	
3389	17AC	BD 09	.WORD HERE	

LINE #	LOC	CODE	LINE
3390	17AE	75 08	.WORD THREE
3391	17B0	0C 06	.WORD SEMIS
3392	17B2	;	
3393	17B2	;	
3394	17B2	;	LOOP
3395	17B2	;	SCREEN 73 LINE 11
3396	17B2	;	
3397	17B2	C4	L3313 .BYTE \$C4, "LOO", \$D0
3397	17B3	4C 4F 4F	
3397	17B6	DO	
3398	17B7	A1 17	.WORD L3300 ; LINK TO DO
3399	17B9	D6 07	.WORD DOCOL
3400	17BB	75 08	.WORD THREE
3401	17BD	58 0B	.WORD QPAIR
3402	17BF	9F 0B	.WORD COMP
3403	17C1	77 03	.WORD PLOOP
3404	17C3	5C 17	.WORD BACK
3405	17C5	0C 06	.WORD SEMIS
3406	17C7	;	
3407	17C7	;	
3408	17C7	;	+LOOP
3409	17C7	;	SCREEN 73 LINE 13
3410	17C7	;	
3411	17C7	C5	L3327 .BYTE \$C5, "+LOO", \$D0
3411	17C8	2B 4C	
3411	17CC	DO	
3412	17CD	B2 17	.WORD L3313 ; LINK TO LOOP
3413	17CF	D6 07	.WORD DOCOL
3414	17D1	75 08	.WORD THREE
3415	17D3	58 0B	.WORD QPAIR
3416	17D5	9F 0B	.WORD COMP
3417	17D7	A7 03	.WORD PPLOO
3418	17D9	5C 17	.WORD BACK
3419	17DB	0C 06	.WORD SEMIS
3420	17DD	;	
3421	17DD	;	
3422	17DD	;	UNTIL
3423	17DD	;	SCREEN 73 LINE 15
3424	17DD	;	
3425	17DD	C5	L3341 .BYTE \$C5, "UNTI", \$CC
3425	17DE	55 4E	
3425	17E2	CC	
3426	17E3	C7 17	.WORD L3327 ; LINK TO +LOOP
3427	17E5	D6 07	UNTIL .WORD DOCOL
3428	17E7	65 08	.WORD ONE
3429	17E9	58 0B	.WORD QPAIR
3430	17EB	9F 0B	.WORD COMP
3431	17ED	56 03	.WORD ZBRAN
3432	17EF	5C 17	.WORD BACK
3433	17F1	0C 06	.WORD SEMIS
3434	17F3	;	
3435	17F3	;	
3436	17F3	;	END
3437	17F3	;	SCREEN 74 LINE 1
3438	17F3	;	

LINE #	LOC	CODE	LINE
3439	17F3	C3	L3355 .BYTE \$C3, 'EN', \$C4
3439	17F4	45 4E	
3439	17F6	C4	
3440	17F7	DD 17	.WORD L3341 ; LINK TO UNTIL
3441	17F9	D6 07	.WORD DOCOL
3442	17FB	E5 17	.WORD UNTIL
3443	17FD	0C 06	.WORD SEMIS
3444	17FF		;
3445	17FF		;
3446	17FF		;
3447	17FF		;
3448	17FF		;
3449	17FF	C5	L3365 .BYTE \$C5, 'AGAI', \$CE
3449	1800	41 47	
3449	1804	CE	
3450	1805	F3 17	.WORD L3355 ; LINK TO END
3451	1807	D6 07	AGAIN .WORD DOCOL
3452	1809	65 08	.WORD ONE
3453	180B	58 0B	.WORD QPAIR
3454	180D	9F 0B	.WORD COMP
3455	180F	37 03	.WORD BRAN
3456	1811	5C 17	.WORD BACK
3457	1813	0C 06	.WORD SEMIS
3458	1815		;
3459	1815		;
3460	1815		;
3461	1815		;
3462	1815		;
3463	1815	C6	L3379 .BYTE \$C6, 'REPEA', \$D4
3463	1816	52 45	
3463	181B	D4	
3464	181C	FF 17	.WORD L3365 ; LINK TO AGAIN
3465	181E	D6 07	.WORD DOCOL
3466	1820	3A 06	.WORD TOR
3467	1822	3A 06	.WORD TOR
3468	1824	07 18	.WORD AGAIN
3469	1826	4C 06	.WORD RFROM
3470	1828	4C 06	.WORD RFROM
3471	182A	6D 08	.WORD TWO
3472	182C	FA 09	.WORD SUB
3473	182E	80 17	.WORD ENDIF
3474	1830	0C 06	.WORD SEMIS
3475	1832		;
3476	1832		;
3477	1832		;
3478	1832		;
3479	1832		;
3480	1832	C2	L3396 .BYTE \$C2, 'I', \$C6
3480	1833	49	
3480	1834	C6	
3481	1835	15 18	.WORD L3379 ; LINK TO REPEAT
3482	1837	D6 07	IF .WORD DOCOL
3483	1839	9F 0B	.WORD COMP
3484	183B	56 03	.WORD ZBRAN
3485	183D	BD 09	.WORD HERE

LINE #	LOC	CODE	LINE
3486	183F	5D 08	.WORD ZERO
3487	1841	D9 09	.WORD COMMA
3488	1843	6D 08	.WORD TWO
3489	1845	0C 06	.WORD SEMIS
3490	1847	;	
3491	1847	;	
3492	1847	;	ELSE
3493	1847	;	SCREEN 74 LINE 10
3494	1847	;	
3495	1847	C4	L3411 .BYTE \$C4, 'ELS', \$C5
3495	1848	45 4C 53	
3495	184B	C5	
3496	184C	32 18	.WORD L3396 ; LINK TO IF
3497	184E	D6 07	.WORD DOCOL
3498	1850	6D 08	.WORD TWO
3499	1852	58 0B	.WORD QPAIR
3500	1854	9F 0B	.WORD COMP
3501	1856	37 03	.WORD BRAN
3502	1858	BD 09	.WORD HERE
3503	185A	5D 08	.WORD ZERO
3504	185C	D9 09	.WORD COMMA
3505	185E	22 07	.WORD SWAP
3506	1860	6D 08	.WORD TWO
3507	1862	80 17	.WORD ENDIF
3508	1864	6D 08	.WORD TWO
3509	1866	0C 06	.WORD SEMIS
3510	1868	;	
3511	1868	;	
3512	1868	;	WHILE
3513	1868	;	SCREEN 74 LINE 13
3514	1868	;	
3515	1868	C5	L3431 .BYTE \$C5, 'WHIL', \$C5
3515	1869	57 48	
3515	186D	C5	
3516	186E	47 18	.WORD L3411 ; LINK TO ELSE
3517	1870	D6 07	.WORD DOCOL
3518	1872	37 18	.WORD IF
3519	1874	AE 09	.WORD TWOP
3520	1876	0C 06	.WORD SEMIS
3521	1878	;	
3522	1878	;	
3523	1878	;	SPACES
3524	1878	;	SCREEN 75 LINE 1
3525	1878	;	
3526	1878	86	L3442 .BYTE \$86, 'SPACE', \$D3
3526	1879	53 50	
3526	187E	D3	
3527	187F	68 18	.WORD L3431 ; LINK TO WHILE
3528	1881	D6 07	SPACS .WORD DOCOL
3529	1883	5D 08	.WORD ZERO
3530	1885	EA 12	.WORD MAX
3531	1887	6D 0A	.WORD DDUP
3532	1889	56 03	.WORD ZBRAN
3533	188B	0C 00	L3449 .WORD \$0C L3455-L3449
3534	188D	5D 08	.WORD ZERO

LINE #	LOC	CODE	LINE	
3535	188F	DE 03		.WORD PDO
3536	1891	5E 0A	L3452	.WORD SPACE
3537	1893	77 03		.WORD PLOOP
3538	1895	FC FF	L3454	.WORD \$FFFF
3539	1897	0C 06	L3455	.WORD SEMIS
3540	1899			;
3541	1899			;
3542	1899			;
3543	1899			;
3544	1899	82	L3460	.BYTE \$82, '<', \$A3
3544	189A	3C		
3544	189B	A3		
3545	189C	78 18		.WORD L3442 ; LINK TO SPACES
3546	189E	D6 07	BDIGS	.WORD DOCOL
3547	18A0	5E 0E		.WORD PAD
3548	18A2	99 09		.WORD HLD
3549	18A4	9D 07		.WORD STORE
3550	18A6	0C 06		.WORD SEMIS
3551	18A8			;
3552	18A8			;
3553	18A8			;
3554	18A8			;
3555	18A8	82	L3471	.BYTE \$82, '#', \$BE
3555	18A9	23		
3555	18AA	BE		
3556	18AB	99 18		.WORD L3460 ; LINK TO <#
3557	18AD	D6 07	EDIGS	.WORD DOCOL
3558	18AF	19 07		.WORD DROP
3559	18B1	19 07		.WORD DROP
3560	18B3	99 09		.WORD HLD
3561	18B5	79 07		.WORD AT
3562	18B7	5E 0E		.WORD PAD
3563	18B9	08 07		.WORD OVER
3564	18BB	FA 09		.WORD SUB
3565	18BD	0C 06		.WORD SEMIS
3566	18BF			;
3567	18BF			;
3568	18BF			;
3569	18BF			;
3570	18BF	84	L3486	.BYTE \$84, 'SIG', \$CE
3570	18C0	53 49 47		
3570	18C3	CE		
3571	18C4	A8 18		.WORD L3471 ; LINK TO #>
3572	18C6	D6 07	SIGN	.WORD DOCOL
3573	18C8	4A 0A		.WORD ROT
3574	18CA	88 06		.WORD ZLESS
3575	18CC	56 03		.WORD ZBRAN
3576	18CE	07 00	L3492	.WORD \$7 L3496-L3492
3577	18D0	67 02		.WORD CLIT
3578	18D2	2D		.BYTE \$2D
3579	18D3	46 0E		.WORD HOLD
3580	18D5	0C 06	L3496	.WORD SEMIS
3581	18D7			;
3582	18D7			;
3583	18D7			;
				# SCREEN 75 LINE 9

LINE #	LOC	CODE	LINE
3584	18D7		;
3585	18D7	81	L3501 .BYTE \$81,\$A3
3585	18D8	A3	
3586	18D9	BF 18	.WORD L3486 ; LINK TO SIGN
3587	18DB	D6 07	DIG .WORD DOCOL
3588	18DD	6D 09	
3589	18DF	79 07	.WORD BASE
3590	18E1	A6 13	.WORD AT
3591	18E3	4A 0A	.WORD MSMOD
3592	18E5	67 02	.WORD ROT
3593	18E7	09	.WORD CLIT
3594	18E8	08 07	.BYTE 9
3595	18EA	1F 0A	.WORD OVER
3596	18EC	56 03	.WORD LESS
3597	18EE	07 00	.WORD ZBRAN
3598	18F0	67 02	L3513 .WORD 7 L3517-L3513
3599	18F2	07	.WORD CLIT
3600	18F3	99 06	.BYTE 7
3601	18F5	67 02	L3517 .WORD PLUS
3602	18F7	30	.WORD CLIT
3603	18F8	99 06	.BYTE \$30
3604	18FA	46 0E	.WORD PLUS
3605	18FC	0C 06	.WORD HOLD
3606	18FE		.WORD SEMIS
3607	18FE		;
3608	18FE		;
3609	18FE		;
3610	18FE	82	L3526 .BYTE \$82,'#',\$D3
3610	18FF	23	
3610	1900	D3	
3611	1901	D7 18	.WORD L3501 ; LINK TO #
3612	1903	D6 07	DIGS .WORD DOCOL
3613	1905	DB 18	L3529 .WORD DIG
3614	1907	08 07	
3615	1909	08 07	.WORD OVER
3616	190B	AD 05	.WORD OVER
3617	190D	73 06	.WORD OR
3618	190F	56 03	.WORD ZEQU
3619	1911	F4 FF	L3535 .WORD \$FFF4 L3529-L3535
3620	1913	0C 06	.WORD ZBRAN
3621	1915		.WORD SEMIS
3622	1915		;
3623	1915		;
3624	1915		;
3625	1915	83	L3541 .BYTE \$83,'D.',\$D2
3625	1916	44 2E	
3625	1918	D2	
3626	1919	FE 18	.WORD L3526 ; LINK TO #S
3627	191B	D6 07	DDOTR .WORD DOCOL
3628	191D	3A 06	.WORD TOR
3629	191F	22 07	.WORD SWAP
3630	1921	08 07	.WORD OVER
3631	1923	C4 12	.WORD DABS
3632	1925	9E 18	.WORD BDIGS
3633	1927	03 19	.WORD DIGS

LINE #	LOC	CODE	LINE	
3634	1929	C6 18	.WORD SIGN	
3635	192B	AD 18	.WORD EDIGS	
3636	192D	4C 06	.WORD RFROM	
3637	192F	08 07	.WORD OVER	
3638	1931	FA 09	.WORD SUB	
3639	1933	81 18	.WORD SPACS	
3640	1935	95 0C	.WORD TYPE	
3641	1937	0C 06	.WORD SEMIS	
3642	1939		;	
3643	1939		;	D.
3644	1939		;	SCREEN 76 LINE 5
3645	1939		;	
3646	1939	82	L3562 .BYTE \$82,'D',\$AE	
3646	193A	44		
3646	193B	AE		
3647	193C	15 19	.WORD L3541	; LINK TO D.R
3648	193E	D6 07	DDOT .WORD DOCOL	
3649	1940	5D 08	.WORD ZERO	
3650	1942	1B 19	.WORD DDOTR	
3651	1944	5E 0A	.WORD SPACE	
3652	1946	0C 06	.WORD SEMIS	
3653	1948		;	
3654	1948		;	.R
3655	1948		;	SCREEN 76 LINE 7
3656	1948		;	
3657	1948	82	L3573 .BYTE \$82,'.',\$D2	
3657	1949	2E		
3657	194A	D2		
3658	194B	39 19	.WORD L3562	LINK TO D.
3659	194D	D6 07	DOTR .WORD DOCOL	
3660	194F	3A 06	.WORD TOR	
3661	1951	82 12	.WORD STOD	
3662	1953	4C 06	.WORD RFROM	
3663	1955	1B 19	.WORD DDOTR	
3664	1957	0C 06	.WORD SEMIS	
3665	1959		;	
3666	1959		;	
3667	1959		;	SCREEN 76 LINE 9
3668	1959		;	
3669	1959	81	L3585 .BYTE \$81,\$AE	
3669	195A	AE		
3670	195B	48 19	.WORD L3573	; LINK TO .R
3671	195D	D6 07	DOT .WORD DOCOL	
3672	195F	82 12	.WORD STOD	
3673	1961	3E 19	.WORD DDOT	
3674	1963	0C 06	.WORD SEMIS	
3675	1965		;	
3676	1965		;	?
3677	1965		;	SCREEN 76 LINE 11
3678	1965		;	
3679	1965	81	L3595 .BYTE \$81,\$BF	
3679	1966	BF		
3680	1967	59 19	.WORD L3585	; LINK TO .
3681	1969	D6 07	QUES .WORD DOCOL	
3682	196B	79 07	.WORD AT	

LINE #	LOC	CODE	LINE
3683	196D	5D 19	.WORD DOT
3684	196F	0C 06	.WORD SEMIS
3685	1971		;
3686	1971		;
3687	1971		;
3688	1971		;
3689	1971	84	L3605 .BYTE \$84, 'LIS', \$D4
3689	1972	4C 49 53	
3689	1975	D4	
3690	1976	65 19	.WORD L3595 ; LINK TO ?
3691	1978	D6 07	LIST .WORD DOCOL
3692	197A	FD 0B	.WORD DECIM
3693	197C	F4 04	.WORD CR
3694	197E	3A 07	.WORD DUP
3695	1980	32 09	.WORD SCR
3696	1982	9D 07	.WORD STORE
3697	1984	F6 0C	.WORD PDOTQ
3698	1986	06	.BYTE 6, 'SCR #'
3698	1987	53 43	
3699	198D	5D 19	.WORD DOT
3700	198F	67 02	.WORD CLIT
3701	1991	10	.BYTE 16
3702	1992	5D 08	.WORD ZERO
3703	1994	DE 03	.WORD PDO
3704	1996	F4 04	L3620 .WORD CR
3705	1998	F7 03	.WORD I
3706	199A	75 08	.WORD THREE
3707	199C	4D 19	.WORD DOTR
3708	199E	5E 0A	.WORD SPACE
3709	19A0	F7 03	.WORD I
3710	19A2	32 09	.WORD SCR
3711	19A4	79 07	.WORD AT
3712	19A6	58 15	.WORD DLINE
3713	19A8	77 03	.WORD PLOOP
3714	19AA	EC FF	L3630 .WORD \$FFEC L3620-L3630
3715	19AC	F4 04	.WORD CR
3716	19AE	0C 06	.WORD SEMIS
3717	19B0		;
3718	19B0		;
3719	19B0		;
3720	19B0		;
3721	19B0	85	L3637 .BYTE \$85, 'INDE', \$D8
3721	19B1	49 4E	
3721	19B5	D8	
3722	19B6	71 19	.WORD L3605 ; LINK TO LIST
3723	19B8	D6 07	.WORD DOCOL
3724	19BA	F4 04	.WORD CR
3725	19BC	A1 09	.WORD ONEP
3726	19BE	22 07	.WORD SWAP
3727	19C0	DE 03	.WORD PDO
3728	19C2	F4 04	L3647 .WORD CR
3729	19C4	F7 03	.WORD I
3730	19C6	75 08	.WORD THREE
3731	19C8	4D 19	.WORD DOTR
3732	19CA	5E 0A	.WORD SPACE

LINE #	LOC	CODE	LINE
3733	19CC	5D 08	.WORD ZERO
3734	19CE	F7 03	.WORD I
3735	19D0	58 15	.WORD DLINE
3736	19D2	ED 04	.WORD QTERM
3737	19D4	56 03	.WORD ZBRAN
3738	19D6	04 00	L3657 .WORD 4 L3659-L3657
3739	19D8	1F 06	.WORD LEAVE
3740	19DA	77 03	L3659 .WORD PLOOP
3741	19DC	E6 FF	L3660 .WORD \$FFE6 L3647-L3660
3742	19DE	67 02	.WORD CLIT
3743	19E0	0C	.BYTE \$0C FORM FEED FOR PRINTER
3744	19E1	D7 04	.WORD EMIT
3745	19E3	0C 06	.WORD SEMIS
3746	19E5		;
3747	19E5		;
3748	19E5		;
3749	19E5		;
3750	19E5	85	L3666 .BYTE \$85,'TRIA',\$C4
3750	19E6	54 52	
3750	19EA	C4	
3751	19EB	B0 19	.WORD L3637 ; LINK TO INDEX
3752	19ED	D6 07	.WORD DOCOL
3753	19EF	75 08	.WORD THREE
3754	19F1	63 13	.WORD SLASH
3755	19F3	75 08	.WORD THREE
3756	19F5	44 13	.WORD STAR
3757	19F7	75 08	.WORD THREE
3758	19F9	08 07	.WORD OVER
3759	19FB	99 06	.WORD PLUS
3760	19FD	22 07	.WORD SWAP
3761	19FF	DE 03	.WORD PDO
3762	1A01	F4 04	L3681 .WORD CR
3763	1A03	F7 03	.WORD I
3764	1A05	78 19	.WORD LIST
3765	1A07	77 03	.WORD PLOOP
3766	1A09	F8 FF	L3685 .WORD \$FFF8 L3681-L3685
3767	1A0B	F4 04	.WORD CR
3768	1A0D	67 02	.WORD CLIT
3769	1A0F	0F	.BYTE \$F
3770	1A10	6C 15	.WORD MESS
3771	1A12	F4 04	.WORD CR
3772	1A14	67 02	.WORD CLIT
3773	1A16	0C	.BYTE \$0C FORM FEED FOR PRINTER
3774	1A17	D7 04	.WORD EMIT
3775	1A19	0C 06	.WORD SEMIS
3776	1A1B		;
3777	1A1B		;
3778	1A1B		;
3779	1A1B		;
3780	1A1B	85	L3696 .BYTE \$85,'VLIS',\$D4
3780	1A1C	56 4C	
3780	1A20	D4	
3781	1A21	E5 19	.WORD L3666 ; LINK TO TRIAD
3782	1A23	D6 07	VLIST .WORD DOCOL
3783	1A25	67 02	.WORD CLIT

LINE #	LOC	CODE	LINE
3784	1A27	80	.BYTE \$80
3785	1A28	29 09	.WORD OUT
3786	1A2A	9D 07	.WORD STORE
3787	1A2C	4B 09	.WORD CON
3788	1A2E	79 07	.WORD AT
3789	1A30	79 07	.WORD AT
3790	1A32	29 09	L3706 .WORD OUT
3791	1A34	79 07	.WORD AT
3792	1A36	88 08	.WORD CSLL
3793	1A38	3C 0A	.WORD GREAT
3794	1A3A	56 03	.WORD ZBRAN
3795	1A3C	0A 00	L3711 .WORD \$A
3796	1A3E	F4 04	.WORD CR
3797	1A40	5D 08	.WORD ZERO
3798	1A42	29 09	.WORD OUT
3799	1A44	9D 07	.WORD STORE
3800	1A46	3A 07	L3716 .WORD DUP
3801	1A48	02 10	.WORD IDDOT
3802	1A4A	5E 0A	.WORD SPACE
3803	1A4C	5E 0A	.WORD SPACE
3804	1A4E	EA 0A	.WORD PFA
3805	1A50	B8 0A	.WORD LFA
3806	1A52	79 07	.WORD AT
3807	1A54	3A 07	.WORD DUP
3808	1A56	73 06	.WORD ZEQU
3809	1A58	ED 04	.WORD QTERM
3810	1A5A	AD 05	.WORD OR
3811	1A5C	56 03	.WORD ZBRAN
3812	1A5E	D4 FF	L3728 .WORD \$FFD4
3813	1A60	19 07	.WORD DROP
3814	1A62	0C 06	.WORD SEMIS
3815	1A64		;
3816	1A64		;
3817	1A64		MON
3818	1A64		SCREEN 79 LINE 3
3819	1A64	83	NTOP .BYTE \$83, 'MO', \$CE
3819	1A65	4D 4F	
3819	1A67	CE	
3820	1A68	1B 1A	.WORD L3696
3821	1A6A	6C 1A	MON .WORD *+2
3822	1A6C	86 B5	STX XSAVE
3823	1A6E	00	BRK
3824	1A6F	A6 B5	LDX XSAVE
3825	1A71	4C 44 02	JMP NEXT
3826	1A74		;
3827	1A74		TOP .END FOR1/1 ; END OF LISTING

ERRORS = 0000 <0000>

SYMBOL TABLE

SYMBOL	VALUE						
ABORT	121D	ABS	12B5	AGAIN	1807	ALLOT	09CD
ANDD	0598	AT	0779	BACK	175C	BASE	096D
BBUF	08AC	BDIGS	189E	BINARY	05A3	BL	087E
BLANK	0E37	BLK	0918	BLOCK	14D5	BMAG	0420
BOS	0020	BRAN	0337	BSCR	08B8	BUFFR	148D
BUILD	0C40	BUMP	0360	CAT	078E	CCOMM	09EA
CFA	0AC7	CLIT	0267	CMOVE	04FE	COLD	1245
COLON	07C2	COMMA	09D9	COMP	0B9F	CON	094B
CONST	080B	COUNT	0C82	CR	04F4	CREAT	1036
CRLF	DOD2	CSLL	0888	CSP	0988	CSTOR	07B5
CURR	0958	DABS	12C4	DAREA	3B60	DBCD	1671
DDISC	1633	DDOT	193E	DDOTR	191B	DDUP	0A6D
DECIM	0BFD	DECNP	02FB	DECNP1	0301	DEFIN	11CE
DFIND	0F8D	DIG	18DB	DIGIT	0401	DIGS	1903
DLINE	1558	DLIT	10DE	DMINU	06F1	DOCOL	07D6
DOCON	0815	DODE	0C5C	DOES	0C50	DOT	195D
DOTR	194D	DOUSE	084A	DOVAR	0831	DOVOC	11A6
DP	0901	DPL	0976	DPLUS	06B2	DPM	12A3
DRO	1468	DROP	0719	DTRAI	OCC3	DUP	073A
EDIGS	18AD	EMIT	04D7	ENCL	0498	ENDIF	1780
ENTER	0200	EQUAL	0A06	ERASE	0E26	ERROR	0FC0
EXEC	031F	EXPEC	0D41	FENCE	08F9	FILL	0E06
FIRST	0894	FLD	097F	FORG	16F1	FORTH	11B6
GREAT	0A3C	HERE	09BD	HEX	0BE8	HEX2	D2CE
HLD	0999	HOLD	0E46	I	03F7	IDDOT	1002
IF	1837	IN	0920	INCH	D1DC	INTER	1120
IP	00AE	KEY	04DF	L1000	08BC	L1010	08D0
L1018	08D9	L1026	08E4	L1034	08F1	L1042	08FC
L1050	0904	L1058	0912	L1066	091B	L107	034C
L1074	0923	L1082	092C	L1090	0935	L1098	0941
L1106	094E	L1114	095B	L1122	0966	L1130	0970
L1138	0979	L1146	0982	L1154	098B	L1162	0993
L1170	099C	L1180	09A9	L1190	09B6	L1200	09C5
L1210	09D5	L122	036B	L1222	09E5	L1234	09F6
L1244	0A02	L1246	0AOE	L1254	0A1B	L1258	0A30
L1260	0A33	L1264	0A38	L127	036E	L1274	0A44
L1286	0A56	L1296	0A66	L130	0379	L1301	0A73
L1303	0A77	L1308	0A79	L1312	0A88	L1320	0A97
L1328	0A9F	L1339	0AB2	L1350	0AC1	L1360	0ACF
L1373	0AE4	L1386	0AF7	L1397	0B08	L1402	0B17
L1405	0B1D	L1406	0B1F	L1407	0B21	L1412	0B23
L1426	0B3A	L1439	0B4F	L1451	0B63	L1466	0B7B
L1480	0B95	L1495	0BB1	L1507	0BBF	L1519	0BCE
L1531	0BE2	L154	039D	L1543	0BF3	L1555	0C08
L1568	0C20	L1582	0C36	L1592	0C48	L1622	0C7A
L1634	0C8E	L1639	0C9B	L1644	0CA5	L1648	0CAD
L1650	0CB1	L1651	0CB3	L1652	0CB5	L1657	0CB7
L1663	0CCB	L1672	0CDD	L1675	0CE3	L1676	0CE5
L1678	0CE9	L1679	0CEB	L1685	0CEF	L1701	0DOA
L1709	0D1A	L1718	0D2C	L1719	0D2E	L1723	0D36
L1729	0D38	L1736	0D4B	L1744	0D5A	L1759	0D77
L1760	0D79	L1765	0D82	L1771	0D8E	L1772	0D90
L1773	0D92	L1779	0D9E	L1781	0DA2	L1788	0DA8
L1804	0DC3	L1810	0DCF	L1824	0DED	L1828	0DF5
L1829	0DF7	L1830	0DF9	L1832	0DFD	L1838	0DFF
L185	03D7	L1856	0E1E	L1866	0E2E	L1876	0E3F

SYMBOL TABLE

SYMBOL	VALUE	SYMBOL	VALUE	SYMBOL	VALUE	SYMBOL	VALUE
L1890	0E58	L1902	0E69	L1908	0E78	L1913	0E82
L1914	0E84	L1916	0E88	L1943	0EB5	L1950	0EC7
L1956	0ED2	L1961	0EDB	L1962	0EDD	L1968	0EE1
L1971	0EEE	L1979	0EFE	L1994	0F1C	L1998	0F24
L2000	0F28	L2001	0F2A	L2007	0F2E	L2023	0F54
L2031	0F64	L2041	0F77	L2042	0F79	L2045	0F7F
L2047	0F83	L2052	0F85	L2068	0FA9	L207	03F3
L2073	0FB3	L2078	0FB5	L2087	0FC5	L2094	0FD7
L2096	0FDB	L2113	0FFC	L214	03F9	L2142	102D
L2155	104B	L2163	105A	L22	0224	L2200	1099
L2216	10B7	L2222	10C9	L2226	10D1	L2232	10D3
L2238	10E6	L2242	10EE	L2248	10F0	L2269	1114
L227	0415	L2272	1122	L2274	1126	L2279	1130
L2283	1138	L2284	113A	L2286	113E	L2288	1142
L2289	1144	L2295	1150	L2298	1156	L2299	1158
L2301	115C	L2302	115E	L2303	1160	L2309	1162
L2321	1179	L234	0422	L2346	11AE	L2357	11C0
L2369	11DA	L2381	11E7	L2388	11F8	L2396	1208
L2399	120F	L2400	1211	L2406	1215	L2423	123E
L243	0429	L2433	1259	L2437	1263	L2453	127B
L2464	128C	L2469	1297	L2471	129B	L2476	129D
L2481	12A9	L2483	12AD	L2488	12AF	L249	043B
L2498	12BD	L2508	12CC	L2515	12DC	L2517	12E0
L2523	12E4	L2530	12F4	L2532	12F8	L2538	12FC
L254	0445	L2556	1319	L2579	1340	L2589	134C
L2601	135F	L2612	136D	L2622	137B	L2634	138F
L2645	139E	L2662	13BC	L2670	13C6	L2678	13D1
L2688	13E8	L2691	13EE	L2700	13F8	L2705	1417
L2716	1444	L2729	1462	L2740	1472	L2751	1484
L2758	1497	L2760	149B	L2767	14A9	L2776	14BD
L2788	14CD	L280	0470	L2804	14F1	L2805	14F3
L2808	14F9	L281	0472	L2818	150D	L2826	151D
L2830	1525	L2835	1436	L2838	152D	L2839	1440
L284	0477	L2857	1550	L2868	1562	L2874	1574
L2877	157A	L2886	158B	L2887	158D	L2888	158F
L2891	159A	L2896	159C	L2924	15CF	L30	0235
L301	048E	L3030	162B	L3032	165A	L3040	165D
L3050	166A	L3060	1683	L31	0237	L313	04A9
L318	04B2	L3202	16D4	L3217	16E8	L3220	170A
L3225	1724	L3228	172B	L3250	1755	L326	04C1
L3261	1766	L327	04C4	L3273	1778	L3290	1794
L3300	17A1	L3313	17B2	L3327	17C7	L3341	17DD
L3355	17F3	L3365	17FF	L337	04D0	L3379	1815
L3396	1832	L3411	1847	L3431	1868	L344	04D9
L3442	1878	L3449	188B	L3452	1891	L3454	1895
L3455	1897	L3460	1899	L3471	18A8	L3486	18BF
L3492	18CE	L3496	18D5	L35	0260	L3501	18D7
L351	04E1	L3513	18EE	L3517	18F5	L3526	18FE
L3529	1905	L3535	1911	L3541	1915	L3562	1939
L3573	1948	L358	04EF	L3585	1959	L3595	1965
L3605	1971	L3620	1996	L3630	19AA	L3637	19B0
L3647	19C2	L365	04F6	L3657	19D6	L3659	19DA
L3660	19DC	L3666	19E5	L3681	1A01	L3685	1A09
L3696	1A1B	L370	0505	L3706	1A32	L3711	1A3C
L3716	1A46	L3728	1A5E	L375	0510	L386	051E
L396	0533	L411	0550	L418	0556	L433	0573

SYMBOL TABLE

SYMBOL	VALUE						
L444	0587	L453	0592	L469	05A8	L484	05BD
L499	05D3	L511	05E2	L522	05F2	L536	0607
L54	025D	L548	0617	L563	0635	L577	0647
L591	0659	L605	066E	L613	067E	L619	0683
L63	0307	L632	0695	L649	06AD	L670	06D0
L685	06E8	L700	0701	L711	0712	L718	071B
L733	0734	L744	0744	L75	0315	L754	0758
L762	0761	L773	0775	L781	0784	L787	0789
L798	0799	L806	07A9	L813	07B0	L823	07BE
L853	07EE	L867	0800	L885	0820	L89	032E
L902	083D	L920	0859	L928	0861	L936	0869
L944	0871	L952	0879	L960	0882	L968	088C
L976	0898	L984	08A4	L992	08B0	LATES	0AA8
LBRAC	0BB5	LEAVE	061F	LESS	0A1F	LETTER	D2C1
LFA	0AB8	LIMIT	08A0	LIST	1978	LIT	022A
LITER	10C1	LOAD	15A3	MAX	12EA	MEM	4000
MESS	156C	MIN	12D2	MINUS	06D8	MOD	1373
MON	1A6A	MSLAS	131E	MSMOD	13A6	MSTAR	1301
N	00A6	NBUF	0008	NEXT	0244	NFA	0AD5
NP	0014	NTOP	1A64	NUMBER	0F37	OFSET	093E
ONE	0865	ONEKEY	D1DC	ONEP	09A1	OR	05AD
ORIG	0200	OUT	0929	OUTCH	D2C1	OVER	0708
PABOR	0FBF	PAD	0E5E	PBUF	13D8	PDO	03DE
PDOTQ	0CF6	PFA	0AEA	PFIND	0432	PL1	0384
PL2	0391	PLINE	1536	PLOOP	0377	PLUS	0699
PM	1291	PN1	02E4	PN2	02EB	PNUMB	0EEC
POP	03EE	POPTWO	03EC	PORIG	08C6	PPLOO	03A7
PREV	13CD	PRNAM	02D9	PSCOD	0C12	PSTOR	0749
PUSH	023D	PUSHOA	05DC	PUT	023F	QCOMP	0B2B
QCSP	0B6A	QERR	0B11	QEXEC	0B42	QLOAD	0B86
QPAIR	0B58	QSTAC	10F9	QTERM	04ED	QUERY	0DB0
QUES	1969	QUIT	11EE	R	065D	RBRAC	0BC3
REENTR	0204	RFROM	064C	RNUM	0990	ROT	0A4A
RPSTO	05F8	RSLW	1689	SCR	0932	SCSP	0AFE
SECTL	0640	SECTR	0320	SEMIS	060C	SETUP	0304
SIGN	18C6	SLASH	1363	SLMOD	1353	SMUDG	0BD7
SPACE	0A5E	SPACS	1881	SPAT	05D9	SPSTO	05E8
SSIZE	0080	SSLAS	1394	SSMOD	1383	STAR	1344
STATE	0963	STOD	1282	STORE	079D	SUB	09FA
SWAP	0722	TCOLON	02BE	TCR	D0F1	THREE	0875
TIB	08D6	TIBX	0100	TICK	16D8	TOGGL	076A
TOP	1A74	TOR	063A	TOS	009E	TRACE	026F
TRAV	0A84	TWO	086D	TWOP	09AE	TYPE	0C95
UAREA	3F80	ULESS	0A13	UNTIL	17E5	UP	00B3
UPDAT	1401	UPPER	0EBD	USE	13C2	USER	0844
USLAS	055B	USTAR	0523	VAR	082B	VLO	11BE
VLIST	1A23	VOCL	090F	W	00B1	WARM	1257
WARN	08EE	WIDTH	08E1	WORD	0E70	XBLANK	DOAF
XCR	1621	XEMIT	15F1	XFOR	11BC	XKEY	160C
XOR	05C3	XQTER	1616	XSAVE	00B5	XW	0012
ZBRAN	0356	ZEQU	0673	ZERO	085D	ZLESS	0688

END OF ASSEMBLY

HEX 200 1A74 DUMP

0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
200	EA	4C	47	12	EA	4C	57	12	4	0	D2	5E	7D	20	7F	0
210	80	3F	9E	0	FF	1	0	1	1F	0	1	0	9	24	9	24
220	7B	20	4C	44	83	4C	49	D4	0	0	2C	2	B1	AE	48	E6
230	AE	D0	2	E6	AF	B1	AE	E6	AE	DO	2	E6	AF	CA	CA	95
240	1	68	95	0	A0	1	B1	AE	85	B2	88	B1	AE	85	B1	EA
250	EA	EA	18	A5	AE	69	2	85	AE	90	2	E6	AF	4C	B0	0
260	84	43	4C	49	D4	24	2	69	2	B1	AE	48	98	FO	C8	86
270	B5	20	D2	DO	A5	AF	20	CE	D2	A5	AE	20	CE	D2	20	AF
280	DO	A0	0	B1	AE	85	12	85	14	C8	B1	AE	85	13	85	15
290	20	D9	2	A5	13	20	CE	D2	A5	12	20	CE	D2	20	AF	DO
2A0	A5	B5	20	CE	D2	20	AF	DO	A9	1	20	CE	D2	BA	E8	8A
2B0	20	CE	D2	20	AF	DO	EA	EA	EA	A6	B5	A0	0	60	86	B5
2C0	A5	B1	85	14	A5	B2	85	15	20	D2	DO	A9	3A	20	C1	D2
2D0	20	AF	DO	20	D9	2	A6	B5	60	20	FB	2	20	FB	2	20
2E0	FB	2	A0	0	20	FB	2	B1	14	10	F9	C8	B1	14	20	C1
2F0	D2	B1	14	10	F6	20	AF	DO	A0	0	60	A5	14	DO	2	C6

0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
300	15	C6	14	60	A	85	A5	B5	0	99	A6	0	E8	C8	C4	A5
310	DO	F5	A0	0	60	87	45	58	45	43	55	54	C5	60	2	21
320	3	B5	0	85	B1	B5	1	85	B2	E8	E8	4C	B0	0	86	42
330	52	41	4E	43	C8	15	3	39	3	18	B1	AE	65	AE	48	C8
340	B1	AE	65	AF	85	AF	68	85	AE	4C	46	2	87	30	42	52
350	41	4E	43	C8	2E	3	58	3	E8	E8	B5	FE	15	FF	F0	D9
360	18	A5	AE	69	2	85	AE	90	2	E6	AF	4C	44	2	86	28
370	4C	4F	4F	50	A9	4C	3	79	3	86	B5	BA	FE	1	1	DO
380	3	FE	2	1	18	BD	3	1	FD	1	1	BD	4	1	FD	2
390	1	A6	B5	A	90	A3	68	68	68	68	4C	60	3	87	28	2B
3A0	4C	4F	4F	50	A9	6E	3	A9	3	E8	E8	86	B5	B5	FF	48
3B0	48	B5	FE	BA	E8	E8	18	7D	1	1	9D	1	1	68	7D	2
3C0	1	9D	2	1	68	10	BD	18	BD	1	1	FD	3	1	BD	2
3D0	1	FD	4	1	4C	91	3	84	28	44	4F	A9	9D	3	E0	3
3E0	B5	3	48	B5	2	48	B5	1	48	B5	0	48	E8	E8	E8	E8
3F0	4C	44	2	81	C9	D7	3	5F	6	85	44	49	47	49	D4	F3

0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
400	3	3	4	38	B5	2	E9	30	30	18	C9	A	30	7	38	E9
410	7	C9	A	30	D	D5	0	10	9	95	2	A9	1	48	98	4C
420	3F	2	98	48	E8	E8	4C	3F	2	86	28	46	49	4E	44	A9
430	F9	3	34	4	A9	2	20	4	3	86	B5	A0	0	B1	A6	51
440	A8	29	3F	DO	2D	C8	B1	A6	51	A8	A	D0	23	90	F6	A6
450	B5	CA	CA	CA	18	98	69	5	65	A6	95	2	A0	0	98	
460	65	A7	95	3	94	1	B1	A6	95	0	A9	1	48	4C	3D	2
470	B0	5	C8	B1	A6	10	FB	C8	B1	A6	AA	C8	B1	A6	85	A7
480	86	A6	5	A6	DO	B5	A6	B5	A9	0	48	4C	3D	2	87	45
490	4E	43	4C	4F	53	C5	29	4	9A	4	A9	2	20	4	3	8A
4A0	38	E9	8	AA	94	3	94	1	88	C8	B1	A8	C5	A6	F0	F9
4B0	94	4	B1	A8	DO	E	94	2	94	0	98	D5	4	D0	2	F6
4C0	2	4C	44	2	94	2	C8	C5	A6	DO	E7	94	0	4C	44	2
4D0	84	45	4D	49	D4	8E	4	F1	15	83	4B	45	D9	D0	4	C
4E0	16	89	3F	54	45	52	4D	49	4E	41	CC	D9	4	16	16	82
4F0	43	D2	E1	4	21	16	85	43	4D	4F	56	C5	EF	4	0	5

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
500	A9	3	20	4	3	C4	A6	DO	7	C6	A7	10	3	4C	44	2	LD
510	B1	AA	91	A8	C8	D0	EE	E6	AB	E6	A9	4C	5	5	82	55	L U
520	AA	F6	4	25	5	B5	2	85	A6	94	2	B5	3	85	A7	94	%
530	3	A0	10	16	2	36	3	36	0	36	1	90	13	18	A5	A6	6 6 6
540	75	2	95	2	A5	A7	75	3	95	3	A9	0	75	0	95	0	u u u
550	88	D0	EO	4C	44	2	82	55	AF	1E	5	5D	5	B5	4	B4	LD U]
560	2	94	4	A	95	2	B5	5	B4	3	94	5	2A	95	3	A9	*
570	10	85	A6	36	4	36	5	38	B5	4	F5	0	A8	B5	5	F5	6 6 8
580	1	90	4	94	4	95	5	36	2	36	3	C6	A6	D0	E4	4C	6 6 L
590	EE	3	83	41	4E	C4	56	5	9A	5	B5	0	35	2	48	B5	AN V 5 H
5A0	1	35	3	E8	E8	4C	3F	2	82	4F	D2	92	5	AF	5	B5	5 L? 0
5B0	0	15	2	48	B5	1	15	3	E8	E8	4C	3F	2	83	58	4F	H L? XO
5C0	D2	A8	5	C5	5	B5	0	55	2	48	B5	1	55	3	E8	E8	U H U
5D0	4C	3F	2	83	53	50	CO	BD	5	DB	5	8A	48	A9	0	4C	L? SP H L
5E0	3D	2	83	53	50	A1	D3	5	EA	5	A0	6	B1	B3	AA	4C	= SP L
5F0	44	2	83	52	50	A1	E2	5	FA	5	86	B5	A0	8	B1	B3	D RP

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
600	AA	9A	A6	B5	4C	44	2	82	3B	D3	F2	5	E	6	68	85	LD ; h
610	AE	68	85	AF	4C	44	2	85	4C	45	41	56	C5	7	6	21	h LD LEAV !
620	6	86	B5	BA	BD	1	1	9D	3	1	BD	2	1	9D	4	1	
630	A6	B5	4C	44	2	82	3E	D2	17	6	3C	6	B5	1	48	B5	LD > < H
640	0	48	E8	E8	4C	44	2	82	52	BE	35	6	4E	6	CA	CA	H LD R 5 N
650	68	95	0	68	95	1	4C	44	2	81	D2	47	6	5F	6	86	h h LD G -
660	B5	BA	BD	1	1	48	BD	2	1	A6	B5	4C	3D	2	82	30	H L= 0
670	BD	59	6	75	6	B5	0	15	1	94	1	D0	1	C8	94	0	Y u
680	4C	44	2	82	30	BC	6E	6	8A	6	16	1	98	2A	94	1	LD 0 n *
690	95	0	4C	44	2	81	AB	83	6	9B	6	18	B5	0	75	2	LD u
6A0	95	2	B5	1	75	3	95	3	E8	E8	4C	44	2	82	44	AB	u LD D
6B0	95	6	B4	6	18	B5	2	75	6	95	6	B5	3	75	7	95	u u
6C0	7	B5	0	75	4	95	4	B5	1	75	5	95	5	4C	EC	3	u u L
6D0	85	4D	49	4E	55	D3	AD	6	DA	6	38	98	F5	0	95	0	MINU 8
6E0	98	F5	1	95	1	4C	44	2	86	44	4D	49	4E	55	D3	DO	LD DMINU
6F0	6	F3	6	38	98	F5	2	95	2	98	F5	3	95	3	4C	DB	8 L

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
700	6	84	4F	56	45	D2	E8	6	A	7	B5	2	48	B5	3	4C	OVE H L
710	3D	2	84	44	52	4F	D0	1	7	EE	3	84	53	57	41	D0	= DRO SWA
720	12	7	24	7	B5	2	48	B5	0	95	2	B5	3	B4	1	94	\$ H
730	3	4C	3F	2	83	44	55	D0	1B	7	3C	7	B5	0	48	B5	L? DU < H
740	1	4C	3D	2	82	2B	A1	34	7	4B	7	18	A1	0	75	2	L= + 4 K u
750	81	0	F6	0	D0	2	F6	1	A1	0	75	3	81	0	4C	EC	u L
760	3	86	54	4F	47	47	4C	C5	44	7	6C	7	A1	2	55	0	TOGGL D 1 U
770	81	2	4C	EC	3	81	CO	61	7	7B	7	A1	0	48	F6	0	L a { H
780	D0	2	F6	1	A1	0	4C	3F	2	82	43	CO	75	7	90	7	L? C u
790	A1	0	95	0	94	1	4C	44	2	81	A1	89	7	9F	7	B5	LD
7A0	2	81	0	F6	0	D0	2	F6	1	B5	3	81	0	4C	EC	3	L
7B0	82	43	A1	99	7	B7	7	B5	2	81	0	4C	EC	3	C1	BA	C L
7C0	BO	7	D6	7	42	B	FE	A	58	9	79	7	4B	9	9D	7	B X y K
7D0	36	10	C3	B	12	C	A5	AF	48	A5	AE	48	EA	EA	EA	18	6 H H
7E0	A5	B1	69	2	85	AE	98	65	B2	85	AF	4C	44	2	C1	BB	i e LD
7F0	BE	7	D6	7	6A	B	9F	B	C	6	D7	B	B5	B	C	6	j

0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F		
800	88	43	4F	4E	53	54	41	4E	D4	EE	7	D6	7	36	10	D7	CONSTAN 6
810	B	D9	9	12	C	A0	2	B1	B1	48	C8	B1	B1	4C	3D	2	H L=
820	88	56	41	52	49	41	42	4C	C5	0	8	D6	7	B	8	12	VARIABL
830	C	18	A5	B1	69	2	48	98	65	B2	4C	3D	2	84	55	53	i H e L= US
840	45	D2	20	8	D6	7	B	8	12	C	A0	2	18	B1	B1	65	E e
850	B3	48	A9	0	65	B4	4C	3D	2	81	B0	3D	8	15	8	0	H e L= =
860	0	81	B1	59	8	15	8	1	0	81	B2	61	8	15	8	2	Y a
870	0	81	B3	69	8	15	8	3	0	82	42	CC	71	8	15	8	i B q
880	20	0	83	43	2F	CC	79	8	15	8	40	0	85	46	49	52	C/ y @ FIR
890	53	D4	82	8	15	8	60	3B	85	4C	49	4D	49	D4	8C	8	S `; LIMI
8A0	15	8	80	3F	85	42	2F	42	55	C6	98	8	15	8	80	0	? B/BU
8B0	85	42	2F	53	43	D2	A4	8	15	8	8	0	87	2B	4F	52	B/SC +OR
8C0	49	47	49	CE	BO	8	D6	7	2A	2	0	2	99	6	C	6	IGI *
8D0	83	54	49	C2	BC	8	4A	8	A	85	57	49	44	54	C8	DO	TI J WIDT
8E0	8	4A	8	C	87	57	41	52	4E	49	4E	C7	D9	8	4A	8	J WARNIN J
8F0	E	85	46	45	4E	43	C5	E4	8	4A	8	10	82	44	DO	F1	FENC J D

0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F		
900	8	4A	8	12	88	56	4F	43	2D	4C	49	4E	CB	FC	8	4A	J VOC-LIN J
910	8	14	83	42	4C	CB	4	9	4A	8	16	82	49	CE	12	9	BL J I
920	4A	8	18	83	4F	55	D4	1B	9	4A	8	1A	83	53	43	D2	J OU J SC
930	23	9	4A	8	1C	86	4F	46	46	53	45	D4	2C	9	4A	8	# J OFFSE , J
940	1E	87	43	4F	4E	54	45	58	D4	35	9	4A	8	20	87	43	CONTEX 5 J C
950	55	52	52	45	4E	D4	41	9	4A	8	22	85	53	54	41	54	URREN A J " STAT
960	C5	4E	9	4A	8	24	84	42	41	53	C5	5B	9	4A	8	26	N J \$ BAS [J &
970	83	44	50	CC	66	9	4A	8	28	83	46	4C	C4	70	9	4A	DP f J (FL p J
980	8	2A	83	43	53	D0	79	9	4A	8	2C	82	52	A3	82	9	* CS y J , R
990	4A	8	2E	83	48	4C	C4	8B	9	4A	8	30	82	31	AB	93	J . HL J 0 1
9A0	9	D6	7	65	8	99	6	C	6	82	32	AB	9C	9	D6	7	e 2
9B0	6D	8	99	6	C	6	84	48	45	52	C5	A9	9	D6	7	1 m HER	
9C0	9	79	7	C	6	85	41	4C	4C	4F	D4	B6	9	D6	7	1 y ALLO	
9D0	9	49	7	C	6	81	AC	C5	9	D6	7	BD	9	9D	7	6D I m	
9E0	8	CD	9	C	6	82	43	AC	D5	9	D6	7	BD	9	B5	7 C	
9F0	65	8	CD	9	C	6	81	AD	E5	9	D6	7	D8	6	99	6 e	

0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F		
A00	C	6	81	BD	F6	9	D6	7	FA	9	73	6	C	6	82	55	s U
A10	BC	2	A	D6	7	FA	9	88	6	C	6	81	BC	E	A	21	!
A20	A	38	B5	2	F5	0	B5	3	F5	1	94	3	50	2	49	80	8 P I
A30	10	1	C8	94	2	4C	EE	3	81	BE	1B	A	D6	7	22	7	L "
A40	1F	A	C	6	83	52	4F	D4	38	A	D6	7	3A	6	22	7	RO 8 :
A50	4C	6	22	7	C	6	85	53	50	41	43	C5	44	A	D6	7	L " SPAC D
A60	7E	8	D7	4	C	6	84	2D	44	55	D0	56	A	D6	7	3A ~ -DU V :	
A70	7	56	3	4	0	3A	7	C	6	88	54	52	41	56	45	52	V : TRAVER
A80	53	C5	66	A	D6	7	22	7	8	7	99	6	67	2	7F	8 S f " g	
A90	7	8E	7	1F	A	56	3	F1	FF	22	7	19	7	C	6	86	V "
AA0	4C	41	54	45	53	D4	79	A	D6	7	58	9	79	7	79	7 LATES y X y y	
AB0	C	6	83	4C	46	C1	9F	A	D6	7	67	2	4	FA	9	C LF g	
AC0	6	83	43	46	C1	B2	A	D6	7	6D	8	FA	9	C	6	83 CF m	
AD0	4E	46	C1	C1	A	D6	7	67	2	5	FA	9	2A	2	FF	FF NF g *	
AE0	84	A	C	6	83	50	46	C1	CF	A	D6	7	65	8	84	A PF e	
AF0	67	2	5	99	6	C	6	84	21	43	53	DO	E4	A	D6	7 g	!CS

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
B00	D9	5	88	9	9D	7	C	6	86	3F	45	52	52	4F	D2	F7	?ERRO
B10	A	D6	7	22	7	56	3	8	0	CD	F	37	3	4	0	19	" V 7
B20	7	C	6	85	3F	43	4F	4D	D0	8	B	D6	7	63	9	79	?COM c y
B30	7	73	6	67	2	11	11	B	C	6	85	3F	45	58	45	C3	s g ?EXE
B40	23	B	D6	7	63	9	79	7	67	2	12	11	B	C	6	86	# c y g
B50	3F	50	41	49	52	D3	3A	B	D6	7	FA	9	67	2	13	11	?PAIR : g
B60	B	C	6	84	3F	43	53	D0	4F	B	D6	7	D9	5	88	9	?CS O
B70	79	7	FA	9	67	2	14	11	B	C	6	88	3F	4C	4F	41	y g ?LOA
B80	44	49	4E	C7	63	B	D6	7	18	9	79	7	73	6	67	2	DIN c y s g
B90	16	11	B	C	6	87	43	4F	4D	50	49	4C	C5	7B	B	D6	COMPIL {
BA0	7	2B	B	4C	6	3A	7	AE	9	3A	6	79	7	D9	9	C	+ L : : y
BB0	6	C1	DB	95	B	D6	7	5D	8	63	9	9D	7	C	6	81] c
BC0	DD	B1	B	D6	7	67	2	CO	63	9	9D	7	C	6	86	53	g c S
BDO	4D	55	44	47	C5	BF	B	D6	7	A8	A	67	2	20	6A	7	MUDG g j
BE0	C	6	83	48	45	D8	CE	B	D6	7	67	2	10	6D	9	9D	HE g m
BFO	7	C	6	87	44	45	43	49	4D	41	CC	E2	B	D6	7	67	DECIMA g

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
C00	2	A	6D	9	9D	7	C	6	87	28	3B	43	4F	44	45	A9	m (;CODE
C10	F3	B	D6	7	4C	6	A8	A	EA	A	C7	A	9D	7	C	6	L
C20	C5	3B	43	4F	44	C5	8	C	D6	7	6A	B	9F	B	12	C	;COD j
C30	B5	B	80	1A	C	6	87	3C	42	55	49	4C	44	D3	20	C	<BUILD
C40	D6	7	5D	8	B	8	C	6	85	44	4F	45	53	BE	36	C] DOES 6
C50	D6	7	4C	6	A8	A	EA	A	9D	7	12	C	A5	AF	48	A5	L H
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C70	69	4	48	A5	B2	69	0	4C	3D	2	85	43	4F	55	4E	D4	i H i L = COUN
C80	48	C	D6	7	3A	7	A1	9	22	7	8E	7	C	6	84	54	H : " T
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CA0	6	22	7	DE	3	F7	3	8E	7	D7	4	77	3	F8	FF	37	" w 7
CBO	3	4	0	19	7	C	6	89	2D	54	52	41	49	4C	49	4E	-TRAILIN
CC0	C7	8E	C	D6	7	3A	7	5D	8	DE	3	8	7	8	7	99	:]
CDO	6	65	8	FA	9	8E	7	7E	8	FA	9	56	3	8	0	1F	e ~ V
CEO	6	37	3	6	0	65	8	FA	9	77	3	E0	FF	C	6	84	7 e w
CFO	28	2E	22	A9	B7	C	D6	7	5D	6	82	C	3A	7	A1	9	(.)] :

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D30	BD	9	82	C	95	C	C	6	86	45	58	50	45	43	D4	A	EXPEC
D40	D	D6	7	8	7	99	6	8	7	DE	3	DF	4	3A	7	67	: g
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D70	6	3A	6	FA	9	37	3	27	0	3A	7	67	2	D	6	A	: 7 : g
D80	56	3	E	0	1F	6	19	7	7E	8	5D	8	37	3	4	0	V ~] 7
D90	3A	7	F7	3	B5	7	5D	8	F7	3	A1	9	9D	7	D7	4	:]
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F60	FA	9	56	3	15	0	3A	7	8E	7	67	2	2E	FA	9	5D	V : g .]
F70	8	11	B	5D	8	37	3	DD	FF	19	7	4C	6	56	3	4] 7 L V
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FC0	7	1D	12	C	6	85	45	52	52	4F	D2	B5	F	D6	7	EE	ERRO
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FEO	C	F6	C	4	20	20	3F	20	6C	15	E8	5	19	7	19	7	? 1
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1000	C5	F	D6	7	5E	E	67	2	20	67	2	5F	6	E	3A	7	^ g ^ g - : :
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1020	82	C	67	2	1F	98	5	95	C	5E	A	C	6	86	43	52	g ^ CR
1030	45	41	54	C5	FC	F	D6	7	D6	8	BD	9	67	2	A0	99	EAT g
1040	6	13	A	6D	8	11	B	8D	F	56	3	F	0	19	7	D5	m V
1050	A	2	10	67	2	4	6C	15	5E	A	BD	9	3A	7	8E	7	g 1 ^ :
1060	E1	8	79	7	D2	12	A1	9	CD	9	1	9	8E	7	67	2	y g
1070	FD	6	A	CD	9	3A	7	67	2	A0	6A	7	BD	9	65	8	: g j e
1080	FA	9	67	2	80	6A	7	A8	A	D9	9	58	9	79	7	9D	g j X y
1090	7	BD	9	AE	9	D9	9	C	6	C9	5B	43	4F	4D	50	49	[COMPI
10A0	4C	45	DD	2D	10	D6	7	8D	F	73	6	5D	8	11	B	19	LE - s]
10B0	7	C7	A	D9	9	C	6	C7	4C	49	54	45	52	41	CC	99	LITERA
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10D0	9	C	6	C8	44	4C	49	54	45	52	41	CC	B7	10	D6	7	DLITERA
10E0	63	9	79	7	56	3	8	0	22	7	C1	10	C1	10	C	6	c y V "
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1100	13	A	65	8	11	B	D9	5	67	2	20	13	A	67	2	7					
1110	11	B	C	6	89	49	4E	54	45	52	50	52	45	D4	F0	10		INTERPRE			
1120	D6	7	8D	F	56	3	1E	0	63	9	79	7	1F	A	56	3	V	c	y	V	
1130	A	0	C7	A	D9	9	37	3	6	0	C7	A	1F	3	F9	10		7			
1140	37	3	1C	O	BD	9	37	F	76	9	79	7	A1	9	56	3	7	7	v	y	V
1150	8	0	DE	10	37	3	6	0	19	7	C1	10	F9	10	37	3	7			7	
1160	C2	FF	89	49	4D	4D	45	44	49	41	54	C5	14	11	D6	7		IMMEDIAT			
1170	A8	A	67	2	40	6A	7	C	6	8A	56	4F	43	41	42	55	g	@j	VOCABU		
1180	4C	41	52	D9	62	11	D6	7	40	C	2A	2	81	A0	D9	9	LAR	b	@*		
1190	58	9	79	7	C7	A	D9	9	BD	9	F	9	79	7	D9	9	X	y		y	
11A0	F	9	9D	7	50	C	AE	9	4B	9	9D	7	C	6	C5	46	P	K		F	
11B0	4F	52	54	C8	79	11	5C	C	A6	11	81	A0	AA	1B	0	0	ORT	y	\		
11C0	8B	44	45	46	49	4E	49	54	49	4F	4E	D3	AE	11	D6	7		DEFINITION			
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11E0	67	2	29	70	E	C	6	84	51	55	49	D4	DA	11	D6	7	g)p	QUI		
11F0	5D	8	18	9	9D	7	B5	B	F8	5	F4	4	BO	D	20	11]				

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F					
1200	63	9	79	7	73	6	56	3	7	0	F6	C	2	4F	4B	37	c	y	s	V	OK7
1210	3	E7	FF	C	6	85	41	42	4F	52	D4	E7	11	D6	7	E8		ABOR			
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1230	52	54	48	20	20	31	2E	30	B6	11	CE	11	EE	11	84	43	RTH	1.0		C	
1240	4F	4C	C4	15	12	47	12	AD	C	2	8D	BC	11	AD	D	2	OL	G			
1250	8D	BD	11	A0	15	D0	2	AO	F	AD	10	2	85	B3	AD	11					
1260	2	85	B4	B9	C	2	91	B3	88	10	F8	A9	12	85	AF	A9					
1270	1F	85	AE	D8	A9	6C	85	BO	4C	FA	5	84	53	2D	3E	C4	1	L	S->		
1280	3E	12	D6	7	3A	7	88	6	D8	6	C	6	82	2B	AD	7B	>	:	+	{	
1290	12	D6	7	88	6	56	3	4	0	D8	6	C	6	83	44	2B	V		D+		
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12B0	41	42	D3	9D	12	D6	7	3A	7	91	12	C	6	84	44	41	AB	:		DA	
12C0	42	D3	AF	12	D6	7	3A	7	A3	12	C	6	83	4D	49	CE	B	:		MI	
12D0	BD	12	D6	7	8	7	8	7	3C	A	56	3	4	0	22	7	< V	"			
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	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F					
1300	12	D6	7	8	7	8	7	C3	5	3A	6	B5	12	22	7	B5	:	"			
1310	12	23	5	4C	6	A3	12	C	6	82	4D	AF	FC	12	D6	7	# L	M			
1320	8	7	3A	6	3A	6	C4	12	5D	6	B5	12	5B	5	4C	6	:	:]	[L	
1330	5D	6	C3	5	91	12	22	7	4C	6	91	12	22	7	C	6]	" L	"		
1340	81	AA	19	13	D6	7	23	5	19	7	C	6	84	2F	4D	4F	#		/MO		
1350	C4	40	13	D6	7	3A	6	82	12	4C	6	1E	13	C	6	81	@	:	L		
1360	AF	4C	13	D6	7	53	13	22	7	19	7	C	6	83	4D	4F	L	S	"	MO	
1370	C4	5F	13	D6	7	53	13	19	7	C	6	85	2A	2F	4D	4F	_ S	*	/MO		
1380	C4	6D	13	D6	7	3A	6	1	13	4C	6	1E	13	C	6	82	m	:	L		
1390	2A	AF	7B	13	D6	7	83	13	22	7	19	7	C	6	85	4D	* {	"	M		
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13C0	9E	13	31	8	E4	3B	84	50	52	45	D6	BC	13	31	8	60	1	; PRE	1	'	
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	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
1400	13	D6	7	CD	13	79	7	79	7	2A	2	0	80	AD	5	CD	y y *
1410	13	79	7	9D	7	C	6	85	46	4C	55	53	C8	F8	13	D6	y FLUS
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1430	A1	9	5D	8	DE	3	2A	2	FF	7F	8D	14	19	7	77	3] * w
1440	F6	FF	C	6	8D	45	4D	50	54	59	2D	42	55	46	46	45	EMPTY-BUFFE
1450	52	D3	17	14	D6	7	94	8	A0	8	8	7	FA	9	26	E	R &
1460	C	6	83	44	52	BO	44	14	D6	7	5D	8	3E	9	9D	7	DR D] >
1470	C	6	83	44	52	B1	62	14	D6	7	2A	2	20	3	3E	9	DR b * >
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1490	13	79	7	3A	7	3A	6	D8	13	56	3	FC	FF	C2	13	9D	y : : V
14A0	7	5D	6	79	7	88	6	56	3	14	0	5D	6	AE	9	5D] y V]]
14B0	6	79	7	2A	2	FF	7F	98	5	5D	8	89	16	5D	6	9D	y *] 1 1
14C0	7	5D	6	CD	13	9D	7	4C	6	AE	9	C	6	85	42	4C] L BL
14D0	4F	43	CB	84	14	D6	7	3E	9	79	7	99	6	3A	6	CD	OC > y :
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14F0	3	34	0	D8	13	73	6	56	3	14	0	19	7	5D	6	8D	4 s V]

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	
1500	14	3A	7	5D	6	65	8	89	16	6D	8	FA	9	3A	7	79	:] e m : y
1510	7	5D	6	FA	9	3A	7	99	6	73	6	56	3	D6	FF	3A] : s V :
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1540	4C	6	B8	8	44	13	99	6	D5	14	99	6	88	8	C	6	L D
1550	85	2E	4C	49	4E	C5	2D	15	D6	7	36	15	C3	C	95	C	.LIN - 6
1560	C	6	87	4D	45	53	53	41	47	C5	50	15	D6	7	EE	8	MESSAG P
1570	79	7	56	3	1B	0	6D	A	56	3	11	0	67	2	4	3E	y V m V g >
1580	9	79	7	B8	8	63	13	FA	9	58	15	37	3	D	0	F6	y c X 7
1590	C	6	4D	53	47	20	23	20	5D	19	C	6	84	4C	4F	41	MSG #] LOA
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15B0	6	5D	8	20	9	9D	7	B8	8	44	13	18	9	9D	7	20] D
15C0	11	4C	6	20	9	9D	7	4C	6	18	9	9D	7	C	6	C3	L L
15D0	2D	2D	BE	9C	15	D6	7	86	B	5D	8	20	9	9D	7	B8	--]
15E0	8	18	9	79	7	8	7	73	13	FA	9	18	9	49	7	C	y s I
15F0	6	98	38	A0	1A	71	B3	91	B3	C8	A9	0	71	B3	91	B3	8 q q

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1600	B5	0	86	B5	20	C1	D2	A6	B5	4C	EE	3	86	B5	20	DC	L
1610	D1	A6	B5	4C	DC	5	AD	0	CO	CD	1	CO	29	1	4C	DC	L) L
1620	5	86	B5	20	F1	D0	A6	B5	4C	44	2	85	2D	44	49	53	LD -DIS
1630	C3	CF	15	35	16	B5	0	8D	C	C6	8D	D	C6	B5	2	8D	5
1640	A	C6	8D	B	C6	B5	4	8D	CD	C4	8D	CE	C4	86	B5	AD	
1650	DA	C4	D0	6	20	FE	E1	4C	5D	16	20	62	E2	20	EF	E3	L] b
1660	A6	B5	AD	E1	C4	95	4	4C	EC	3	84	2D	42	43	C4	2B	L -BC +
1670	16	D6	7	5D	8	67	2	A	5B	5	67	2	10	44	13	AD] g [g D
1680	5	C	6	83	52	2F	D7	6A	16	D6	7	73	6	2A	2	DA	R/ j s *
1690	C4	B5	7	22	7	5D	8	9D	7	5D	8	8	7	3C	A	8	"]] <
16A0	7	2A	2	3F	6	3C	A	AD	5	67	2	6	11	B	5D	8	* ? < g]
16B0	2A	2	20	3	5B	5	A1	9	22	7	5D	8	67	2	12	5B	* ["] g [
16C0	5	71	16	22	7	A1	9	71	16	33	16	67	2	8	11	B	q " q 3 g
16D0	C	6	C	6	C1	A7	83	16	D6	7	8D	F	73	6	5D	8	s] FORGE
16E0	11	B	19	7	C1	10	C	6	86	46	4F	52	47	45	D4	D4	: y g
16F0	16	D6	7	D8	16	D5	A	3A	7	F9	8	79	7	13	A	67	

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F		
1700	2	15	11	B	3A	6	F	9	79	7	5D	6	8	7	13	A	:	y]
1710	56	3	12	0	B6	11	CE	11	79	7	3A	7	F	9	9D	7	V	y :
1720	37	3	E8	FF	3A	7	67	2	4	FA	9	EA	A	B8	A	79	7	: g y
1730	7	3A	7	5D	6	13	A	56	3	F2	FF	8	7	6D	8	FA	:] V m
1740	9	9D	7	79	7	6D	A	73	6	56	3	D9	FF	4C	6	1	y m s v	L
1750	9	9D	7	C	6	84	42	41	43	CB	E8	16	D6	7	BD	9		BAC
1760	FA	9	D9	9	C	6	C5	42	45	47	49	CE	55	17	D6	7		BEGI U
1770	2B	B	BD	9	65	8	C	6	C5	45	4E	44	49	C6	66	17	+	e ENDI f
1780	D6	7	2B	B	6D	8	58	B	BD	9	8	7	FA	9	22	7	+ m X	"
1790	9D	7	C	6	C4	54	48	45	CE	78	17	D6	7	80	17	C	THE x	
17A0	6	C2	44	CF	94	17	D6	7	9F	B	DE	3	BD	9	75	8	D	u
17B0	C	6	C4	4C	4F	4F	D0	A1	17	D6	7	75	8	58	B	9F	LOO	u X
17C0	B	77	3	5C	17	C	6	C5	2B	4C	4F	4F	D0	B2	17	D6	w \	+LOO
17D0	7	75	8	58	B	9F	B	A7	3	5C	17	C	6	C5	55	4E	u X	\ UN
17E0	54	49	CC	C7	17	D6	7	65	8	58	B	9F	B	56	3	5C	TI	e X V \
17F0	17	C	6	C3	45	4E	C4	DD	17	D6	7	E5	17	C	6	C5	EN	

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F			
1800	41	47	41	49	CE	F3	17	D6	7	65	8	58	B	9F	B	37	AGAI	e X 7	
1810	3	5C	17	C	6	C6	52	45	50	45	41	D4	FF	17	D6	7	\	REPEA	
1820	3A	6	3A	6	7	18	4C	6	4C	6	6D	8	FA	9	80	17	:	L L m	
1830	C	6	C2	49	C6	15	18	D6	7	9F	B	56	3	BD	9	5D	I	v]	
1840	8	D9	9	6D	8	C	6	C4	45	4C	53	C5	32	18	D6	7	m	ELS 2	
1850	6D	8	58	B	9F	B	37	3	BD	9	5D	8	D9	9	22	7	m X	7] "	
1860	6D	8	80	17	6D	8	C	6	C5	57	48	49	4C	C5	47	18	m m	WHIL G	
1870	D6	7	37	18	AE	9	C	6	86	53	50	41	43	45	D3	68	7	SPACE h	
1880	18	D6	7	5D	8	EA	12	6D	A	56	3	C	0	5D	8	DE]	m v]	
1890	3	5E	A	77	3	FC	FF	C	6	82	3C	A3	78	18	D6	7	^ w	< x	
18A0	5E	E	99	9	9D	7	C	6	82	23	BE	99	18	D6	7	19	~	#	
18B0	7	19	7	99	9	79	7	5E	E	8	7	FA	9	C	6	84	y ~		
18C0	53	49	47	CE	A8	18	D6	7	4A	A	88	6	56	3	7	0	SIG	J V	
18D0	67	2	2D	46	E	C	6	81	A3	BF	18	D6	7	6D	9	79	g -F	m y	
18E0	7	A6	13	4A	A	67	2	9	8	7	1F	A	56	3	7	0	J g	V	
18F0	67	2	7	99	6	67	2	30	99	6	46	E	C	6	82	23	g	g 0 F	#

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F		
1900	D3	D7	18	D6	7	DB	18	8	7	8	7	AD	5	73	6	56		s v
1910	3	F4	FF	C	6	83	44	2E	D2	FE	18	D6	7	3A	6	22	D.	:
1920	7	8	7	C4	12	9E	18	3	19	C6	18	AD	18	4C	6	8		L
1930	7	FA	9	81	18	95	C	C	6	82	44	AE	15	19	D6	7		D
1940	5D	8	1B	19	5E	A	C	6	82	2E	D2	39	19	D6	7	3A]	~ . 9 :
1950	6	82	12	4C	6	1B	19	C	6	81	AE	48	19	D6	7	82	L	H
1960	12	3E	19	C	6	81	BF	59	19	D6	7	79	7	5D	19	C	>	Y y]
1970	6	84	4C	49	53	D4	65	19	D6	7	FD	B	F4	4	3A	7	LIS e	:
1980	32	9	9D	7	F6	C	6	53	43	52	20	23	20	5D	19	67	2	SCR #] g
1990	2	10	5D	8	DE	3	F4	4	F7	3	75	8	4D	19	5E	A]	u M ^
19A0	F7	3	32	9	79	7	58	15	77	3	EC	FF	F4	4	C	6	2	y X w
19B0	85	49	4E	44	45	D8	71	19	D6	7	F4	4	A1	9	22	7	INDE q	"
19C0	DE	3	F4	4	F7	3	75	8	4D	19	5E	A	5D	8	F7	3	u M ^]	
19D0	58	15	ED	4	56	3	4	0	1F	6	77	3	E6	FF	67	2	X V w	g
19E0	C	D7	4	C	6	85	54	52	49	41	C4	B0	19	D6	7	75	TRIA	u
19F0	8	63	13	75	8	44	13	75	8	8	7	99	6	22	7	DE	c u D u	"

0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F	x w	g
1A00	3 F4	4 F7	3 78	19 77	3 F8	FF F4	4 67	2 F								VLIS	
1A10	6C 15 F4	4 67	2 C D7	4 C 6 85	56 4C 49	53 1 g										K y	
1A20	D4 E5 19 D6	7 67	2 80 29	9 9D 7 4B	9 79 7											< v	
1A30	79 7 29	9 79	7 88 8 3C	A 56 3 A 0	F4 4	y) y										~ ~	
1A40	5D 8 29	9 9D 7 3A	7 2 10 5E	A 5E A EA	A A	1) :											
1A50	B8 A 79	7 3A 7 73	6 ED 4 AD	5 56 3 D4	FF y : s											V	
1A60	19 7 C 6 83	4D 4F CE 1B	1A 6C 1A 86	B5 0 A6											MO 1		
1A70	B5 4C 44	2 87 50 2D	43 4F 55 4E	D4 64 1A 31	8 LD P-COUN d 1												

OK

Demonstration of startup, with tracing.

```
*>=200
<R>**** PS AA XX YY SS
      0200 B4 1A A0 00 FD
<G>/
IP      w SP RP
121F SP! 05E8 A0 01FE
1221 DECIMAL 0BFD 9E 01FE
: DECIMAL
0BFF CLIT 0267 9E 01FC
OC02 BASE 096D 9C 01FC
OC04 ! 079D 9A 01FC
OC06 ;S 060C 9E 01FC
1223 DRO 1468 9E 01FE
: DRO
146A 0 085D 9E 01FC
146C OFFSET 093E 9C 01FC
146E ! 079D 9A 01FC
1470 ;S 060C 9E 01FC
1225 CR 04F4 9E 01FE
1227 (.) OCF6 9E 01FE
: (.)
OCF8 R 065D 9E 01FC
OCFA COUNT OC82 9C 01FC
: COUNT
OC84 DUP 073A 9C 01FA
OC86 1+ 09A1 9A 01FA
: 1+
09A3 1 0865 9A 01F8
09A5 + 0699 98 01F8
09A7 ;S 060C 9A 01F8
OC88 SWAP 0722 9A 01FA
OC8A C@ 078E 9A 01FA
OC8C ;S 060C 9A 01FA
OCFC DUP 073A 9A 01FC
OCFE 1+ 09A1 98 01FC
: 1+
09A3 1 0865 98 01FA
09A5 + 0699 96 01FA
09A7 ;S 060C 98 01FA
OD00 R> 064C 98 01FC
```

Enter at cold start

IP = hi.level interpretive pointer

<NAME> of dictionary word

w = code field pointer to
actual machine code

SP = top of data stack

Address

begin colon-def. RP = top of return stack
nest call Address

return from colon-definition
un-nest the call.

begin to print greeting "fig-FORTH"

<M>=02B6 20 DC D1 A6 B5 A0 00 60
</> 02B6 EA EA EA
<G>/
<*>=200
<G>/

121F SP! 05E8 A0 01FE
1221 DECIMAL 0BFD 9E 01FE
: DECIMAL
OBFF CLIT 0267 9E 01FC
OC02 BASE 096D 9C 01FC
OC04 ! 079D 9A 01FC
OC06 ;S 060C 9E 01FC
1223 DRO 1468 9E 01FE
: DRO
146A 0 085D 9E 01FC
146C OFFSET 093E 9C 01FC
146E ! 079D 9A 01FC
1470 ;S 060C 9E 01FC
1225 CR 04F4 9E 01FE

1227 (.) OCF6 9E 01FE
: (.)
OCF8 R 065D 9E 01FC
OCFA COUNT OC82 9C 01FC
: COUNT
OC84 DUP 073A 9C 01FA
OC86 1+ 09A1 9A 01FA
: 1+
09A3 1 0865 9A 01F8
09A5 + 0699 98 01F8
09A7 ;S 060C 9A 01F8
OC88 SWAP 0722 9A 01FA
OC8A C@ 078E 9A 01FA
OC8C ;S 060C 9A 01FA
OCFC DUP 073A 9A 01FC
OCFE 1+ 09A1 98 01FC
: 1+
09A3 1 0865 98 01FA
09A5 + 0699 96 01FA
09A7 ;S 060C 98 01FA
OD00 R> 064C 98 01FC
OD02 + 0699 96 01FE
OD04 >R 063A 98 01FE
OD06 TYPE OC95 9A 01FC
: TYPE
OC97 -DUP 0A6D 9A 01FA

no-op the call to ONEKEY

trace continuously without operators
Keystroke

```
<M>=024F 20 6F 02 18 A5 AE 69 02
</> 024F EA EA EA
<*>=200
<G>/
```

```
: DECIMAL
: DRO

: (.)
: COUNT
: 1+
: 1+
: TYPE
: -DUP fig-FORTH 1.0
: 2+
: DEFINITIONS greeting
: QUIT message
: [
: QUERY input from terminal
: EXPECT operator types
: +ORIGIN
: =
: -
: =
: =
: =
: 1+ 1 emit: 1
: +ORIGIN
: =
: =
: =
: =
: 1+ 2 2
: +ORIGIN
: =
: =
: =
: =
: 1+ 3 3
: +ORIGIN
: =
: =
: =
: =
: 1+ blank
: +ORIGIN
: =
: =
: =
: =
: 1+. dot
: +ORIGIN
: =
: =
: =
: =
: 1+ <return>
: INTERPRET =
: -FIND blank
```

no-op TRACE Only
display the high-level nesting.

```
: WORD : -
: HERE : HERE
: BLANKS : HERE
: FILL : 1+
: 1+ : HERE
: - : COUNT
: - : 1+
: HERE : UPPER
: HERE : >
: 1+ : HERE
: HERE : CFA
: COUNT : -
: 1+ : .
: UPPER : S->D execute
: > lower case "dot"
: > conversion : D.
: > : D.R
: HERE : DABS
: HERE : DT-
: HERE : <#
: LATEST : PAD
: HERE : HERE
: NUMBER : #
: ROT : M/MOD
: 1+ : ROT
: = : HOLD
: - : #
: (NUMBER) : numeric
: 1+ : conversion
: ROT : output
: 1+ : numeric
: 1+ : conversion
: 1+ : ROT
: ROT : HOLD
: 1+ : #
: 1+ : M/MOD
: ROT : ROT
: 1+ : HOLD
: 1+ : SIGN
: 1+ : ROT
: 1+ : #>
: - : PAD
: 1+ : HERE
: LITERAL : -
: ?STACK : -
: U< : SPACES
: - : MAX
: ?ERROR : -DUP
: U< : TYPE
: - : -DUP 123 print
: ?ERROR : SPACE
: -DUP 123 : ?STACK
: SPACE : U<
: ?STACK : -
: U< : ?ERROR
: - : U<
: - : -
: ?ERROR : ?ERROR
```

push to stack

dot's dictionary entry

```

: 1+
: HERE
: COUNT
: 1+
: UPPER
: >
: HERE
: CFA
: -
: execute
: (.) "null" definition
: COUNT
: 1+
: 1+
: TYPE
: -DUP OK print "OK"
: QUERY back to terminal
: EXPECT for user input
<M>=07DC 20 BE 02 18 A5 B1 69 02
</> 07DC EA EA EA
<R>**** PS AA XX YY SS
      0200 B4 1A A0 00 FD
<*>=200
<G>/

```

no-op

'TCOLON'

fig-FORTH 1.0

EMPTY-BUFFERS OK
1234 . 1234 OK

FORTH is fully functional. Be sure to clear disc buffers!

```

VLIST
MON VLIST TRIAD INDEX LIST ? . .R D. D.R #S
# SIGN #> <# SPACES WHILE ELSE IF REPEAT AGAIN
END UNTIL +LOOP LOOP DO THEN ENDIF BEGIN BACK FORGET
' R/W -BCD -DISC --> LOAD MESSAGE .LINE (LINE)
BLOCK BUFFER DR1 DRO EMPTY-BUFFERS FLUSH UPDATE +BUF
PREV USE M/MOD */ */MOD MOD / /MOD * M/ M*
MAX MIN DABS ABS D+- +- S->D COLD ABORT QUIT
( DEFINITIONS FORTH VOCABULARY IMMEDIATE INTERPRET ?STACK
DLITERAL LITERAL [COMPILE] CREATE ID. ERROR (ABORT)
-FIND NUMBER (NUMBER) UPPER WORD PAD HOLD BLANKS
ERASE FILL QUERY EXPECT ." (.) -TRAILING TYPE
COUNT DOES> <BUILDS ;CODE (;CODE) DECIMAL HEX SMUDGE
] [ COMPILE ?LOADING ?CSP ?PAIRS ?EXEC ?COMP ?ERROR
!CSP PFA NFA CFA LFA LATEST TRAVERSE -DUP SPACE
ROT > < U< = - C, , ALLOT HERE 2+ 1+ HLD
R# CSP FLD DPL BASE STATE CURRENT CONTEXT OFFSET
SCR OUT IN BLK VOC-LINK DP FENCE WARNING WIDTH
TIB +ORIGIN B/SCR B/BUF LIMIT FIRST C/L BL 3 2
1 0 USER VARIABLE CONSTANT ; : C! ! C@ @ TOGGLE
+! DUP SWAP DROP OVER DMINUS MINUS D+ + 0< 0=
R R> >R LEAVE ;S RP! SP! SP@ XOR OR AND U/
U* CMOVE CR ?TERMINAL KEY EMIT ENCLOSE (FIND) DIGIT
I (DO) (+LOOP) (LOOP) OBRANCH BRANCH EXECUTE CLIT
LIT OK

```





