"MIND POWER"


```
SCR #39
  0 ( LOAD SCREEN )
  1
  2 D 40 LOAD     ( SP100 & MIDI )
  3 D 76 86 THRU ( SCALES & TST --> TTO )
  4 D 60 65 THRU ( GUIT SCAN & CZ MIDI  )
  5 D 70 74 THRU
  6 ( D 140 LOAD )
  7 D 142 LOAD
  8 D 90 LOAD
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #40
  0 ( SYNTHESIS.S TO FORTH 7/17/85 )
  1 HEX
  2
  3 5 CONSTANT SSLOT ( APPLE SLOT )
  4 C080 SSLOT 10 * + CONSTANT CONTROL
  5 C080 SSLOT 10 * + CONSTANT STATUS
  6 C081 SSLOT 10 * + CONSTANT PAR
  7 C082 SSLOT 10 * + CONSTANT DATAI
  8 0C CONSTANT T1ADR
  9 0E CONSTANT SRADR
 10 11 CONSTANT SR
 11 0 CONSTANT K1ADR
 12 0D CONSTANT  SLOTS
 13 3FE CONSTANT INTVCT
 14 50 CONSTANT BUFPTR ( ZP PTR TO DATA )
 15 52 CONSTANT FRCTR ( INSTEAD OF X REG )
 16 VARIABLE NT1S ( REPEAT COUNTER )
 17 VARIABLE RC    ( REPEAT COUNT )
 18 VARIABLE NSLOTS ( SLOTS COUNTER )
 19 VARIABLE DONE ( FLAG 1= WORD OVER )
 20 VARIABLE DATA ( HI LEVEL PTR )
 21
 22 -->
 23
```

SP1000 SLOT 5
MIDI SLOT 1
GUIT SLOT 4

```
SCR #41
  0 ( CONTINU 1 )
  1 HEX
  2
  3 CODE INCP     ( INCREMENT ZP POINTER )
  4 BUFPTR INC,
  5  0= IF,
  6  BUFPTR 1+ INC, THEN,
  7 RTS,
  8 END-CODE
  9
 10 ( 1= FETCH FROM V-XX          )
 11 VARIABLE XFLAG VARIABLE V-EX ( EXTYP )
 12 VARIABLE NFLAG VARIABLE V-EN ( ENRGY )
 13 VARIABLE PFLAG VARIABLE V-PT ( PITCH )
 14 VARIABLE RFLAG VARIABLE V-RP ( REPEAT)
 15 VARIABLE NOTE ( TO PASS TO MIDI )
 16 VARIABLE CHAN ( JUST HERE FOR CONVEN.)
 17 VARIABLE AMP  ( TO PASS TO MIDI )
 18 VARIABLE NEW  ( FLAG IF NEW FRAME )
 19
 20
 21
 22 -->
 23


SCR #42
  0 ( CONTINU 2 )
  1 DECIMAL ( CURRENT K'S IN FRMM ARRAY )
  2 VARIABLE FRMM 10 ALLOT
  3 VARIABLE EXTYP ( HOLDS EXTYP VALUE )
  4                ( FOR LATER TEST    )
  5 ( NOTE HOLDS LAST PITCH IF UNVOICED )
  6 HEX
  7
  8 CODE WFRM  ( WRITE A FRAME TO SP1000 )
  9 SLOTS # LDA, NSLOTS STA, 0 # LDX,
 10 K1ADR # LDA, PAR STA,  0 # LDY, ( !!! )
 11 BEGIN,
 12   BEGIN, STATUS LDA, 0< NOT UNTIL,
 13  BUFPTR )Y LDA, DATAI STA, FRMM ,X STA,
 14  ' INCP JSR, INX,
 15  NSLOTS DEC,
 16  NSLOTS LDA, 3 # CMP,
 17  0= UNTIL,
 18
 19 ( THIS LOADS IN K10-K1 )
 20 ( NOW PROCEED WITH EXCEPTIONS )
 21
 22 -->
 23
```

```
SCR #43
  0 BEGIN, STATUS LDA, 0< NOT UNTIL,
  1 BUFPTR )Y LDA, EXTYP STA,
  2 XFLAG LDA, 0= IF, BUFPTR )Y LDA,
  3  DATAI STA, ELSE, V-EX LDA, DATAI STA,
  4 THEN, ' INCP JSR, NSLOTS DEC,
  5 BEGIN, STATUS LDA, 0< NOT UNTIL,
  6 BUFPTR )Y LDA, AMP STA,
  7 NFLAG LDA, 0= IF, BUFPTR )Y LDA,
  8  DATAI STA, ELSE, V-EN LDA, DATAI STA,
  9 THEN, ' INCP JSR, NSLOTS DEC,
 10 BEGIN, STATUS LDA, 0< NOT UNTIL,
 11 PFLAG LDA, 0= IF, BUFPTR )Y LDA,
 12  DATAI STA, ELSE, V-PT LDA, DATAI STA,
 13 THEN, EXTYP LDA, 70 # AND, 20 # CMP,
 14 0= NOT IF, BUFPTR )Y LDA, NOTE STA,
 15 THEN,  ' INCP JSR, NSLOTS DEC,
 16 RFLAG LDA, 0= IF, BUFPTR )Y LDA,
 17  RC STA,    ELSE, V-RP LDA, RC STA,
 18 THEN, ' INCP JSR, 1 # LDA, NEW STA,
 19 FRCTR DEC,
 20 0= IF,  1 # LDA, DONE STA, THEN,
 21 RTS, END-CODE --->
 22
 23


SCR #44
  0 ( CONTINU 3 )
  1 HEX
  2
  3 CODE WWFRM ( FIRST TIME ONLY )
  4 XSAVE STX, ' WFRM JSR, XSAVE LDX,
  5 RTS, END-CODE
  6
  7
  8 CODE ISR
  9 TYA, PHA, TXA, PHA,
 10 NT1S INC,
 11 STATUS LDA, RC LDA, NT1S CMP,
 12 0= IF,
 13  0 # LDA, NT1S STA,
 14  ' WFRM JSR,
 15 THEN,
 16 PLA, TAX, PLA, TAY,
 17 45 LDA,      RTI,
 18 END-CODE
 19
 20 CODE ENABLE CLI, NEXT JMP, END-CODE
 21 CODE DISABLE SEI, NEXT JMP, END-CODE
 22 --->
 23
```

```
SCR #45
  0 ( CONTINU 4 )
  1 HEX
  2 CODE SYNTH  ( START SPEAKING )
  3 DATA LDA, BUFFPTR STA,
  4 DATA 1+ LDA, BUFFPTR 1+ STA,
  5 0 # LDA, NT1S STA, RC STA, DONE STA,
  6 44 # LDA, CONTROL STA,
  7 T1ADR # LDA, PAR STA,
  8 FF # LDA, DATAI STA,
  9 BEGIN, STATUS LDA,
 10  0< NOT UNTIL,
 11 SRADR # LDA, PAR STA,
 12 SR # LDA, DATAI STA,
 13 BEGIN, STATUS LDA,
 14  0< NOT UNTIL,
 15 0 # LDY, BUFFPTR )Y LDA, FRCTR STA,
 16 ' INCP JSR,
 17 ' WWFRM JSR,  CLI,
 18 64 # LDA, CONTROL STA,
 19 NEXT JMP, END-CODE
 20 -->
 21
 22
 23


SCR #46
  0 ( ALLTOGETHER = SYN )
  1 HEX
  2 : CLRFLGS 0 0 0 0 XFLAG ! NFLAG !
  3   PFLAG ! RFLAG ! ;
  4
  5
  6
  7 CLRFLGS  ( MAKE SURE TO START WITH )
  8
  9 : SYN
 10   DATA   !
 11   ' ISR INTVCT !
 12   SYNTH
 13   BEGIN ( NOTE C@ MD>SP + C@
 14    ON  40 MS ) DONE @ 0= NOT UNTIL
 15    DISABLE   ;
 16
 17 -->
 18
 19
 20
 21
 22
 23
```

```
SCR #47
  0 ( FILL LPC PARAM SLOT WITH A VALUE )
  1 ( FOR GI FORMAT )
  2
  3 DECIMAL
  4
  5 13 CONSTANT RP
  6 12 CONSTANT PT
  7 11 CONSTANT EN
  8 10 CONSTANT EX
  9 VARIABLE ADDR
 10 VARIABLE VAL
 11 VARIABLE PARAM
 12
 13 : LPCFILL ( PARAM# VAL ADDR --- )
 14   ADDR ! VAL ! PARAM !
 15   ADDR @ C@ 0 DO
 16    VAL C@ ADDR @
 17    I 14 * + PARAM @ +
 18    1+ C!
 19   LOOP I ;
 20
 21 -->
 22
 23


SCR #48
  0 ( COMPILE PITCH-CURVE FILE INTO DICT )
  1 ( ASSUMES GI FORMAT LPC FILE AT $9000 )
  2
  3 HEX  VARIABLE XXX
  4
  5 ( USAGE: <SCR#> CURV-FILE! <NAME> --- )
  6
  7 : CURV-FILE!
  8   CREATE ( NAME )  BLOCK XXX !
  9   XXX @ C@ DUP C, ( NUM OF FRMS )
 10   0 DO
 11    XXX @ I 0E * + PT + 1+ C@ C,
 12   LOOP ;
 13
 14 : CURV-SEE ( ' NAME --- )
 15   DUP C@ 0 DO DUP I + C@ . LOOP DROP ;
 16
 17
 18
 19  -->
 20
 21
 22
 23
```

```
SCR #49
  0 ( COMPILE LPC RECORD AT $9000 TO DICT )
  1 ( ASSUMES GI FORMAT LPC FILE AT $9000 )
  2
  3 HEX
  4
  5 ( USAGE: <SCR#> LPC-FILE! <NAME> )
  6
  7 : LPC-FILE!
  8   CREATE ( NAME )  BLOCK XXX !
  9   XXX @ C@ DUP C, ( NUM OF FRMS )
 10   0E * 0 DO
 11    XXX @ I + 1+ C@ C,
 12   LOOP ;
 13
 14
 15
 16
 17  -->
 18
 19
 20
 21
 22
 23


SCR #50
  0 ( TEST FRAME )
  1
  2 CREATE TESTFRM
  3 0 C, 0 C, 0 C, 0 C, 0 C,
  4 0 C, 0 C, 0 C, 0 C, 0 C,
  5 66 C, ( EXCITATION TYPE )
  6 118 C, ( ENERGY )
  7 60 C, ( PITCH )
  8 10 C, ( REPEAT )
  9
 10 CODE 1FRM
 11 ' WFRM JSR,
 12 NEXT JMP, END-CODE
 13
 14 : TFRM
 15   ' TESTFRM BUFPTR !
 16   1FRM ;
 17
 18
 19
 20 -->
 21
 22
 23
```

```
SCR #51
  0                  -->
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #52
  0 ( MIDI SCREENS 6/29/85 )
  1 HEX
  2
  3 : MS 0 DO  5 0 DO LOOP LOOP ;
  4 1 CONSTANT SLOT
  5 C098 CONSTANT CREG
  6 ( SLOT 8 + 10 *  C000 + CONSTANT CREG)
  7 ( CONTROL REGISTER )
  8 CREG 1+ CONSTANT TREG
  9 ( TRANSMIT/RECEIVE REGISTER )
 10
 11 : MIDI-INIT ( 12 FOR MY 11 FOR PGALOR)
 12   3 CREG C! 0 CREG C! 11 CREG C! ;
 13
 14 CODE POL
 15 BEGIN, CREG LDA, 2 # AND,
 16 0= NOT UNTIL, RTS, END-CODE
 17
 18 CODE POLL ' POL JSR, NEXT JMP, END-CODE
 19
 20
 21
 22 -->
 23
```

```
SCR #53
  0 ( MORE MIDI )
  1 HEX
  2 : SEL 8 + ; : INT 20 + ;
  3 : V1 C0 TREG C! POLL 1- TREG C! POLL ;
  4 : V2 C1 TREG C! POLL 1- TREG C! POLL ;
  5 : V3 C2 TREG C! POLL 1- TREG C! POLL ;
  6 : V4 C3 TREG C! POLL 1- TREG C! POLL ;
  7 : MODU ( N --- )
  8   B0 TREG C! POLL
  9   01 TREG C! POLL
 10   7F AND TREG C! POLL ;
 11 : PORT ( N --- )
 12   B0 TREG C! POLL
 13   05 TREG C! POLL
 14   7F AND TREG C! POLL ;
 15 : BRTH ( N --- )
 16   B0 TREG C! POLL
 17   02 TREG C! POLL
 18   7F AND TREG C! POLL ;
 19 : VOL ( N --- )
 20   B0 TREG C! POLL
 21   07 TREG C! POLL
 22   7F AND TREG C! POLL ;     -->
 23


SCR #54
  0 ( NEW MIDI )
  1 HEX  VARIABLE VEL 7F VEL !
  2 CODE ONN ( FOR ASSEMBLER USE )
  3 CHAN LDA, 90 # ORA, TREG STA,
  4 ' POL JSR,
  5 NOTE LDA, 7F # AND, TREG STA,
  6 ' POL JSR,
  7 VEL  LDA, TREG STA,
  8 ' POL JSR,
  9 RTS, END-CODE
 10
 11   CODE ON2 ( PARAMS FROM NOTE, CHAN )
 12   ' ONN JSR, NEXT JMP, END-CODE
 13
 14 : ON ( NOTE CHAN --- )
 15   90 OR TREG C! POLL
 16   7F AND TREG C! POLL
 17   VEL C@  TREG C! POLL ;
 18
 19 : OFF ( NOTE CHAN --- )
 20   80 OR TREG C! POLL
 21   7F AND TREG C! POLL
 22   00 TREG C! POLL ;
 23 -->
```

```
SCR #55
  0 ( NEW MIDI )
  1 HEX
  2
  3 : ALLOFF ( SETS MONO MODE )
  4   B0 TREG C! POLL
  5   7B TREG C! POLL
  6   00 TREG C! POLL  ;
  7
  8 : WH ( PITCH --- )
  9   E0 TREG C! POLL
 10   00 TREG C! POLL
 11   7F AND TREG C! POLL ;
 12
 13 : ROFF ( RANDOMLY OFF )
 14   0 VEL !
 15   300 0 DO ( TAKES A WHILE ! )
 16    100 RANDOM 0 ON LOOP ;
 17
 18
 19
 20
 21 -->
 22
 23


SCR #56
  0 ( SYSTEM EXCLUSIVE MIDI TESTS 8/27/86 )
  1   HEX
  2
  3 : SEX  ( DATA SW# --- )
  4   F0 TREG C! POLL      ( STATUS )
  5   43 TREG C! POLL      ( ID # )
  6   10 TREG C! POLL      ( CHAN # )
  7   12 TREG C! POLL      ( PARAM GRP # )
  8   7F AND TREG C! POLL  ( SW# )
  9   7F AND TREG C! POLL  ( DATA )
 10   F7 TREG C! POLL      ( EOX )
 11 ;
 12
 13 -->
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #57
  0 ( SP1000 PITCH TO MIDI PITCH TAB )
  1 DECIMAL CREATE SP>MD
  2         96 C, 96 C, 96 C, 96 C, 96 C,
  3 96 C, 96 C, 96 C, 94 C, 92 C, 91 C,
  4 89 C, 87 C, 85 C, 84 C, 83 C, 82 C,
  5 81 C, 80 C, 79 C, 78 C, 77 C, 76 C,
  6 75 C, 74 C, 73 C, 72 C, 72 C, 71 C,
  7 71 C, 70 C, 70 C, 69 C, 69 C, 68 C,
  8 68 C, 68 C, 67 C, 67 C, 66 C, 66 C,
  9 65 C, 65 C, 64 C, 64 C, 64 C, 63 C,
 10 63 C, 63 C, 62 C, 62 C, 62 C, 61 C,
 11 61 C, 61 C, 60 C, 60 C, 60 C, 60 C,
 12 59 C, 59 C, 59 C, 59 C, 58 C, 58 C,
 13 58 C, 58 C, 57 C, 57 C, 57 C, 57 C,
 14 56 C, 56 C, 56 C, 56 C, 55 C, 55 C,
 15 55 C, 55 C, 55 C, 54 C, 54 C, 54 C,
 16 54 C, 54 C, 53 C, 53 C, 53 C, 53 C,
 17 53 C, 53 C, 52 C, 52 C, 52 C, 52 C,
 18 51 C, 51 C, 51 C, 51 C, 51 C, 50 C,
 19 50 C, 50 C, 50 C, 50 C, 50 C, 50 C,
 20 49 C, 49 C, 49 C, 49 C, 49 C, 49 C,
 21 48 C, 48 C, 48 C, 48 C, 48 C, 48 C,
 22 48 C,
 23 -->


SCR #58
  0 ( CONTINUED )
  1 47 C, 47 C, 47 C, 47 C, 47 C, 47 C,
  2 47 C, 46 C, 46 C, 46 C, 46 C, 46 C,
  3 46 C, 46 C, 46 C, 46 C, 46 C, 45 C,
  4 45 C, 45 C, 45 C, 45 C, 45 C, 45 C,
  5 45 C, 44 C, 44 C, 44 C, 44 C, 44 C,
  6 44 C, 44 C, 44 C, 43 C, 43 C, 43 C,
  7 43 C, 43 C, 43 C, 43 C, 43 C, 43 C,
  8 43 C, 42 C, 42 C, 42 C, 42 C, 42 C,
  9 42 C, 42 C, 42 C, 42 C, 41 C, 41 C,
 10 41 C, 41 C, 41 C, 41 C, 41 C, 41 C,
 11 41 C, 41 C, 41 C, 40 C, 40 C, 40 C,
 12 40 C, 40 C, 40 C, 40 C, 40 C, 40 C,
 13 40 C, 39 C, 39 C, 39 C, 39 C, 39 C,
 14 39 C, 39 C, 39 C, 39 C, 39 C, 39 C,
 15 39 C, 39 C, 38 C, 38 C, 38 C, 38 C,
 16 38 C, 38 C, 38 C, 38 C, 38 C, 38 C,
 17 38 C, 38 C, 38 C, 38 C, 37 C, 37 C,
 18 37 C, 37 C, 37 C, 37 C, 37 C, 37 C,
 19 37 C, 37 C, 37 C, 37 C, 37 C, 37 C,
 20 37 C, 37 C, 36 C, 36 C, 36 C, 36 C,
 21 36 C, 36 C, 36 C, 36 C, 36 C, 36 C,
 22 36 C, 36 C, 36 C, 36 C, 36 C, 36 C,
 23 36 C, 36 C, 36 C, 36 C, 36 C,     -->
```

```
SCR #59
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #60
  0 ( NEW GUIT SCANNING PROGRAM CONSTANTS)
  1 HEX
  2
  3 0400 CONSTANT GSLOT ( SLOT * 100 )
  4
  5 C000 GSLOT + CONSTANT GPORTD
  6 C001 GSLOT + CONSTANT GPORTC
  7 C002 GSLOT + CONSTANT GDDRD
  8 C003 GSLOT + CONSTANT GDDRC
  9
 10 C00D GSLOT + CONSTANT GIFR2
 11 C00C GSLOT + CONSTANT GPCR2
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #61
  0 ( BIG SCAN ...)
  1 HEX
  2 VARIABLE SCAN1 20 ALLOT
  3 VARIABLE SCAN1' 20 ALLOT
  4 VARIABLE GUIT1 VARIABLE GUIT1A
  5 VARIABLE G1 VARIABLE G1' VARIABLE G1''
  6 VARIABLE G1A VARIABLE G1A'
  7 VARIABLE G1A''
  8
  9
 10 ( VALUE CHANGED TO ACCOMODATE TITAN
 11   ACCELERATOR 10/85 )
 12 CODE KILLTIME
 13 60 # LDY,
 14 BEGIN, DEY, 0= UNTIL,
 15 NEXT JMP, END-CODE
 16
 17
 18
 19 : RST FF GPORTC C! KILLTIME
 20       00 GPORTC C! KILLTIME ;
 21
 22
 23


SCR #62
  0 ( NEW GUIT SCAN, TITAN ACC 10/85   )
  1
  2 CODE SCANALL XSAVE STX, 0 # LDY,
  3 GPORTC INC, GPORTC INC,
  4 GPORTC INC, GPORTC INC,
  5 10 # LDX, BEGIN, DEX, 0= UNTIL,
  6 BEGIN,
  7  NOP, NOP,  INY,
  8  SCAN1 ,Y LDA, SCAN1' ,Y STA,
  9  GIFR2 LDA, 2 # AND, 0= NOT IF,
 10  FF # LDA, ELSE, 0 # LDA, THEN,
 11  SCAN1 ,Y STA,
 12
 13
 14 GPORTC INC, GPORTC INC, GPORTD LDA,
 15  10 # LDX, BEGIN, DEX, 0= UNTIL,
 16 21 # CPY, 0= UNTIL,
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #63
  0
  1
  2
  3 G1A' LDA, G1A'' STA,
  4 G1A LDA, G1A' STA,
  5 0 # LDA, GUIT1A STA,
  6 8 # LDY,
  7 BEGIN,
  8 SCAN1  ,Y LDA,
  9 0= NOT IF,
 10 GUIT1A STY,
 11 THEN,
 12 DEY, 0= UNTIL,
 13 GUIT1A LDA, G1A STA,
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #64
  0
  1 G1' LDA, G1'' STA,
  2 G1 LDA, G1' STA,
  3 0 # LDA, GUIT1  STA,
  4 20 # LDY,
  5 BEGIN,
  6 SCAN1  ,Y LDA,
  7 0= NOT IF,
  8 GUIT1  STY,
  9 THEN,
 10 DEY, 8 # CPY,
 11 0= UNTIL,
 12 GUIT1 LDA, G1 STA,
 13
 14 XSAVE LDX, NEXT JMP, END-CODE
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #65
  0  ( GUITINIT GUITTEST )
  1 HEX
  2 : GUITINIT
  3   FF GDDRC C!
  4   FF GDDRD C!
  5   55 GPCR2 C! ;
  6
  7 : GUITTEST
  8   GUITINIT
  9   BEGIN
 10    SCANALL
 11    GUIT1 @ . GUIT1A @ . SPACE
 12    CR
 13    RST
 14   ?TERMINAL UNTIL ;
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #66
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #67
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23

SCR #68
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #69
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #70
  0 ( CZ MIDI OUTPUT )
  1 HEX
  2 4 CONSTANT SLOT
  3 SLOT 8 + 10 *  C000 + CONSTANT CREG2
  4 ( CONTROL REGISTER )
  5 CREG2 1+ CONSTANT TREG2
  6 ( TRANSMIT/RECEIVE REGISTER )
  7
  8 : MIDI-INIT2
  9 3 CREG2 C! 0 CREG2 C! 12 CREG2 C! ;
 10
 11 CODE POL2
 12 BEGIN, CREG2 LDA, 2 # AND,
 13 0= NOT UNTIL, RTS, END-CODE
 14
 15 CODE POLL2 ' POL2 JSR, NEXT JMP,
 16 END-CODE
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #71
  0 ( MORE CZ MIDI )
  1 HEX
  2
  3 : SEL2 8 + ;
  4 : INT2 20 + ;
  5
  6 : V12 C0 TREG2 C! POLL2 1- TREG2 C!
  7    POLL2 ;
  8 : V22 C1 TREG2 C! POLL2 1- TREG2 C!
  9    POLL2 ;
 10 : V32 C2 TREG2 C! POLL2 1- TREG2 C!
 11    POLL2 ;
 12 : V42 C3 TREG2 C! POLL2 1- TREG2 C!
 13    POLL2 ;
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #72
  0 ( CZ  MIDI )
  1 HEX
  2
  3 : ON2 ( NOTE CHAN --- )
  4   90 OR TREG2 C! POLL2
  5   7F AND TREG2 C! POLL2
  6   40 TREG2 C! POLL2 ;
  7
  8 : OFF2 ( NOTE CHAN --- )
  9   80 OR TREG2 C! POLL2
 10   7F AND TREG2 C! POLL2
 11   00 TREG2 C! POLL2 ;
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #73
  0 ( CZ  MIDI )
  1 HEX
  2
  3 : ALLOFF2 ( SETS MONO MODE )
  4   B0 TREG2 C! POLL2
  5   7E TREG2 C! POLL2
  6   0 TREG2 C! POLL2
  7   B0 TREG2 C! POLL2
  8   7F TREG2 C! POLL2
  9   0 TREG2 C! ;
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #74
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #75
  0 ( PLAY PITCH FROM SP- TABLES )
  1 ( LIKE TST BUT ONLY PLAYS NEW PITCHES)
  2
  3
  4  DECIMAL
  5     VARIABLE HST
  6 : CP4 0 NEW ! 255 NOTE !
  7    BEGIN NEW @ IF
  8      AMP @ 127 AND    VEL !
  9      NOTE C@ SP>MD + C@
 10      DUP GODS @ + 12 /MOD DROP
 11      WTAB @ + C@ + TRANSP @ +
 12      DUP HST @ = NOT IF DUP HST !
 13      0 ON 0 NEW ! ELSE DROP THEN THEN
 14    DONE @ UNTIL ;
 15
 16 : TTT ( SP# --- )
 17        DATA ! SYNTH CP4 DISABLE ;
 18
 19
 20
 21
 22
 23


SCR #76
  0 ( SCALE TABLES )
  1 CREATE DIATAB
  2 0 C, -1 C, 0 C, 1 C, 0 C,
  3 0 C, 1 C, 0 C, -1 C, 0 C,
  4 1 C, 0 C,
  5 CREATE BLUTAB
  6 0 C, -1 C, 1 C, 0 C, 1 C,
  7 0 C, 0 C, 0 C, 2 C, 1 C,
  8 1 C, 0 C,
  9 CREATE WHOTAB
 10 0 C, -1 C, 0 C, -1 C, 0 C,
 11 1 C, 0 C, 1 C, 0 C, 1 C,
 12 0 C, -1 C,
 13 CREATE CROTAB
 14 0 C, 0 C, 0 C, 0 C, 0 C, 0 C,
 15 0 C, 0 C, 0 C, 0 C, 0 C, 0 C,
 16 CREATE SUFTAB
 17 0 C, 0 C, -1 C, 1 C, 0 C, 0 C,
 18 1 C, 0 C, 0 C, -1 C, 1 C, 0 C,
 19 CREATE PENTAB
 20 0 C, -1 C, 0 C, -1 C, 0 C, 0 C,
 21 1 C, 0 C, -1 C, 0 C, -1 C, 1 C,
 22
 23
```

```
SCR #77
  0 ( SCALE TABLES )
  1 CREATE DIATAB
  2 0 C, -1 C, 0 C, 1 C, 0 C,
  3 0 C, 1 C, 0 C, -1 C, 0 C,
  4 1 C, 0 C,
  5 0 C, -1 C, 0 C, 1 C, 0 C,
  6 0 C, 1 C, 0 C, -1 C, 0 C,
  7 1 C, 0 C,
  8 CREATE BLUTAB
  9 0 C, -1 C, 1 C, 0 C, 1 C,
 10 0 C, 0 C, 0 C, 2 C, 1 C,
 11 1 C, 0 C,
 12 0 C, -1 C, 1 C, 0 C, 1 C,
 13 0 C, 0 C, 0 C, 2 C, 1 C,
 14 1 C, 0 C,
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #78
  0 ( PLAY PITCH FROM SP- TABLES )
  1  DECIMAL
  2 ( ACTUALLY FOLLOW PITCH OF VOICE )
  3 VARIABLE TRANSP 12 TRANSP !
  4 VARIABLE WTAB ( HOLDS SCALE PTR )
  5 DIATAB WTAB ! VARIABLE GODS 0 GODS !
  6
  7 : BD BEGIN DONE @ UNTIL DISABLE ;
  8
  9 : CP3 0 NEW ! 255 NOTE !
 10    BEGIN NEW @ IF
 11    AMP @ 127 AND VEL !
 12    NOTE C@ SP>MD + C@
 13    DUP GODS @ + 12 /MOD DROP
 14    WTAB @ + C@ + TRANSP @ +
 15    0 ON 0 NEW ! THEN
 16   DONE @ UNTIL ;
 17
 18 : TST ( SP# --- )
 19       DATA ! SYNTH CP3 DISABLE ;
 20
 21
 22
 23
```

```
SCR #79
  0 ( PLAY PITCH FROM SP- TABLES )
  1 ( LIKE TST BUT ONLY PLAYS NEW PITCHES)
  2
  3
  4  DECIMAL
  5     VARIABLE HST
  6 : CP4 0 NEW ! 255 NOTE !
  7    BEGIN NEW @ IF
  8      AMP @ 127 AND    VEL !
  9      NOTE C@ SP>MD + C@
 10      DUP GODS @ + 12 /MOD DROP
 11      WTAB @ + C@ + TRANSP @ +
 12      DUP HST @ = NOT IF DUP HST !
 13      0 ON 0 NEW ! ELSE DROP THEN THEN
 14    DONE @ UNTIL ;
 15
 16 : TTT ( SP# --- )
 17        DATA ! SYNTH CP4 DISABLE ;
 18
 19
 20
 21
 22
 23


SCR #80
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #81
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #82
  0 ( LEGATO - MONO WITH PHRASING )
  1  DECIMAL
  2
  3 VARIABLE HS2 ( HISTORY 2 )
  4
  5
  6 : CP8 0 NEW ! 255 NOTE !
  7   0 HST !  0 HS2 !
  8   ALLOFF
  9    BEGIN NEW @ IF
 10    HS2 C@ 0 OFF HST @ HS2 !
 11    AMP @ 127 AND VEL !
 12    NOTE C@ SP>MD + C@
 13    DUP GODS @ + 12 /MOD DROP
 14    WTAB @ + C@ + TRANSP @ +
 15    DUP HST ! 0 ON 0 NEW ! THEN
 16   DONE @ UNTIL ;
 17
 18 : TT8 ( SP# --- )
 19       DATA ! SYNTH CP8 DISABLE ;
 20
 21
 22
 23
```

```
SCR #83
  0 ( LEGATO - MONO WITH PHRASING )
  1  DECIMAL
  2 ( MONO - LEGATO PHRASE ON UNVOICED )
  3
  4
  5 : CP9 0 NEW ! 255 NOTE !
  6    0 HST !  0 HS2 !
  7    ALLOFF
  8     BEGIN NEW @ IF
  9     HS2 C@ 0 OFF HST @ HS2 !
 10     EXTYP C@ 112 AND 32 = IF
 11      ALLOFF ELSE
 12     AMP C@       127 AND        VEL !
 13     NOTE C@ SP>MD + C@
 14     DUP GODS @ + 12 /MOD DROP
 15     WTAB @ + C@ + TRANSP @ +
 16     DUP HST ! 0 ON 0 NEW ! THEN
 17     THEN
 18    DONE @ UNTIL ;
 19
 20 : TT9 ( SP# --- )
 21        DATA ! SYNTH CP9 DISABLE ;
 22
 23


SCR #84
  0 ( LEGATO - MONO W/PHRASING & VEL )
  1  DECIMAL
  2 ( VEL FROM K1 )
  3
  4 : CP0 0 NEW ! 255 NOTE !
  5     BEGIN NEW @ IF
  6     AMP C@ 127 AND VEL !
  7     FRMM 9 + C@ BRTH
  8     NOTE C@ SP>MD + C@
  9     DUP GODS @ + 12 /MOD DROP
 10     WTAB @ + C@ + TRANSP @ +
 11     0 ON 0 NEW ! THEN
 12    DONE @ UNTIL ;
 13
 14 : TT0 ( SP# --- )
 15        DATA ! SYNTH CP0 DISABLE ;
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #85
  0 ( LEGATO - MONO WITH PHRASING )
  1  DECIMAL
  2
  3 VARIABLE HS2 ( HISTORY 2 )
  4
  5
  6 : CPO 0 NEW ! 255 NOTE !
  7   0 HST !  0 HS2 !
  8   ALLOFF
  9    BEGIN NEW @ IF
 10    HS2 C@ 0 OFF HST @ HS2 !
 11  ( AMP @ ) 127 127 AND VEL !
 12    FRMM 9 + C@ 127 AND BRTH
 13    NOTE C@ SP>MD + C@
 14    DUP GODS @ + 12 /MOD DROP
 15    WTAB @ + C@ + TRANSP @ +
 16    DUP HST ! 0 ON 0 NEW ! THEN
 17   DONE @ UNTIL ;
 18
 19 : TTO ( SP# --- )
 20       DATA ! SYNTH CPO DISABLE ;
 21
 22
 23


SCR #86
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #87
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #88
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #89
  0 ( MPTAB )
  1
  2 CREATE MPTAB
  3 M30 , M31 , M32 , M33 , M34 , M35 ,
  4 M36 , M37 , M38 , M39 ,
  5 M40 , M41 , M42 , M43 , M44 , M45 ,
  6 M46 , M47 , M48 , M49 ,
  7 M50 , M51 , M52 , M53 , M54 , M55 ,
  8 M56 , M57 , M58 , M59 ,
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #90
  0 ( NEW SONG 3/1/87 )
  1  DECIMAL VARIABLE TRFLG
  2 : TEST
  3   MIDI-INIT GUITINIT RST
  4    M33 SYN
  5   13 V1 ( MONO BASS ) 1 TRFLG !
  6   BEGIN
  7    SCANALL
  8    GUIT1A @ CASE
  9     1 OF 13 V1 0 TRFLG ! ;;
 10     2 OF 1 RFLAG ! 40 V-RP ! ;;
 11     3 OF 09 V1 12 TRANSP ! 1 TRFLG ! ;;
 12     4 OF 0 RFLAG ! ;;
 13     5 OF 1 PFLAG ! 11 V-PT ! ;;
 14     6 OF 0 PFLAG ! ;;
 15    ENDCASE
 16
 17   GUIT1 @ 0 = NOT IF GUIT1 @
 18   TRFLG @ 0= IF DUP 0 SWAP - 12 +
 19    TRANSP ! THEN
 20   9 - 2* MPTAB + @ TT9 THEN
 21   RST
 22   ?T UNTIL ;
 23
```

```
SCR #91
  0 ( SETTINGS )
  1
  2 : SET1 ( WHISP + 5TH STRING )
  3    1 V12    ' WHOTAB WTAB !
  4    17 48 + V1
  5    CLRFLGS
  6    1 RFLAG ! 1 V-RP !
  7    1 PFLAG ! 250 V-PT !
  8    1 XFLAG ! 35 V-EX ! ;
  9
 10 : SET2 ( VIOLEEN & HIGH VOICE )
 11    4 32 + V12   ' SUFTAB WTAB !
 12    36 0 ON2 43 0 ON2 48 0 ON2 ( CZ101)
 13    9 V1
 14    CLRFLGS
 15    1 RFLAG ! 40 V-RP !
 16    1 PFLAG ! 11 V-PT ! ;
 17
 18 : SET3 ( BASS + NATURAL VOICE )
 19    1 V12 ' DIATAB WTAB !
 20    13 V1
 21    CLRFLGS ;
 22
 23


SCR #92
  0 ( SETTINGS )
  1
  2 : SET4
  3    4 32 + V12   ' BLUTAB WTAB !
  4    36 0 ON2 43 0 ON2 48 0 ON2 ( CZ101)
  5    9 V1
  6    CLRFLGS
  7    1 RFLAG ! 1 PFLAG !
  8    3 V-RP !  120 V-PT ! ;
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

SCR #93
0
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23

SCR #94
0
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23

```
SCR #95
  0 ( NEW SONG 3/1/87 )
  1  DECIMAL VARIABLE TRFLG
  2 : TEST
  3   MIDI-INIT GUITINIT RST MIDI-INIT2
  4    M33 SYN
  5   13 V1 ( MONO BASS ) 1 TRFLG !
  6   BEGIN
  7    SCANALL
  8    GUIT1A @ CASE
  9     1 OF SET3 ;;
 10     3 OF SET2 ;;
 11     5 OF SET1 ;;
 12     7 OF SET4 ;;
 13    ENDCASE
 14   GUIT1 @ 0 = NOT IF GUIT1 @
 15   TRFLG @ 0= IF DUP 0 SWAP - 12 +
 16    TRANSP ! THEN
 17   9 - 2* MPTAB + @ TT9 THEN
 18   RST
 19   ?T UNTIL ;
 20
 21
 22
 23


SCR #96
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #97
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23

SCR #98
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23
```

```
SCR #99
 0
 1
 2
 3
 4
 5
 6
 7
 8
 9
10
11
12
13
14
15
16
17
18
19
20
21
22
23


SCR #100
 0 ( FOLLOWING SCREENS CAN BE LOADED TO )
 1 ( TRANFER AND CONVERT SPEECH FILES   )
 2 ( TRANSLATE ADISA FORMAT TO G.I. )
 3 DECIMAL
 4 CREATE TTAB
 5 14 C, 13 C, 12 C, 11 C, 10 C, 09 C,
 6 08 C, 07 C, 06 C, 05 C, 04 C, 00 C,
 7 01 C, 02 C,
 8
 9 HEX
10
11 ( MOVES IT FROM ONE ADDR TO ANOTHER )
12 ( IT WORKS 7/18/85 )
13 : GI.TRAN ( SRC DEST #FRMS --- )
14   0 DO
15    0E 0 DO
16     2 PICK TTAB I + C@ + C@  ( .S )
17     2 PICK I + C!
18    LOOP
19    0E + SWAP 0F + SWAP
20   LOOP   ;
21 -->
22
23
```

```
SCR #101
  0 ( RECEIVE FILES FROM IBM )
  1
  2 HEX
  3
  4 4 CONSTANT PSLOT
  5 C000 PSLOT 100 * + CONSTANT PORTB
  6 PORTB 2 + CONSTANT DDRB
  7 PORTB 0C + CONSTANT PCR
  8 PORTB 0D + CONSTANT IFR
  9 VARIABLE LOBYTE 2 ALLOT
 10 8000 CONSTANT FBUF
 11 ( REC2 STICKS DATA AT $8000 )
 12
 13 : POLL
 14   BEGIN
 15    IFR C@ 10 AND
 16    0= NOT UNTIL
 17   PORTB C@ DROP ;
 18
 19 : READY E0 PCR C! ; ( HIGH )
 20
 21 : BUSY C0 PCR C! ; ( LOW )
 22 -->
 23


SCR #102
  0 ( CONTINUED )
  1
  2 DECIMAL
  3
  4 : REC2
  5   PORTB C@ DROP
  6   POLL BUSY
  7   PORTB C@ LOBYTE !
  8   READY
  9   POLL BUSY
 10   PORTB C@ LOBYTE 1+ C! READY
 11   LOBYTE @ 0 DO
 12    POLL BUSY
 13    PORTB C@ FBUF I + C!
 14    READY
 15   LOOP ;
 16
 17
 18 -->
 19
 20
 21
 22
 23
```

```
SCR #103
 0 ( SAVE LPC FILE TO SCREEN AFTER REC2 )
 1 HEX   VARIABLE BHOLD ( BLOCK NUM )
 2
 3 ( CONVERT AN ADISA FILE TO GI FORMAT
 4   AND STORE TO A SCREEN )
 5
 6 : STOR ( SCR# --- )
 7   E/B BLOCK DUP BHOLD !
 8   8000 SWAP 1+ LOBYTE @ OF / GI.TRAN
 9   LOBYTE @ OF / BHOLD @ C!
10   UPDATE FLUSH ;
11 : MOV  ( ADDR --- )
12   DUP BHOLD !
13   8000 SWAP 1+ LOBYTE @ OF / GI.TRAN
14   LOBYTE @ OF / BHOLD @ C! ;
15
16
17 ( PLAY A SCREEN )
18
19 : FPLAY ( SCR# --- )
20   BLOCK SYN ;
21
22
23


SCR #104
 0 ( PRINT OUT LPC PARAMS FROM BLOCKS)
 1 HEX
 2 : LPC. ( SCR# --- )
 3   HEX ( AT RUN TIME SO PRINTS OUT HEX)
 4   BLOCK XXX !
 5   XXX @ C@ 0 DO CR
 6    0E 0 DO XXX @ I + J 0E * + 1+
 7     C@ 3 .R  LOOP
 8   LOOP ;
 9
10 : LPC.LS ( START END ---    )
11   SWAP DO 0C EMIT ( FORM FEED )
12   ." SCR #" DECIMAL I . HEX
13   I LPC. LOOP
14   0C EMIT ;
15
16
17
18
19
20
21
22
23
```

SCR #105
0
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23

SCR #106
0
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23

SCR #107
0
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23

SCR #108
0
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23

```
SCR #109
  0
  1
  2
  3
  4
  5
  6
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #110
  0 ( LOAD IN SPEECH SCREENS TO DICT )
  1 DECIMAL
  2 160 LPC-FILE! SP1   160 CURV-FILE! PT1
  3 161 LPC-FILE! SP2   161 CURV-FILE! PT2
  4 162 LPC-FILE! SP3   162 CURV-FILE! PT3
  5 163 LPC-FILE! SP4   163 CURV-FILE! PT4
  6 164 LPC-FILE! SP5   164 CURV-FILE! PT5
  7 165 LPC-FILE! SP6   165 CURV-FILE! PT6
  8 166 LPC-FILE! SP7   166 CURV-FILE! PT7
  9 167 LPC-FILE! SP8   167 CURV-FILE! PT8
 10 168 LPC-FILE! SP9   168 CURV-FILE! PT9
 11 169 LPC-FILE! SP10 169 CURV-FILE! PT10
 12 170 LPC-FILE! SP11 170 CURV-FILE! PT11
 13 171 LPC-FILE! SP12 171 CURV-FILE! PT12
 14 172 LPC-FILE! SP13 172 CURV-FILE! PT13
 15 173 LPC-FILE! SP14 173 CURV-FILE! PT14
 16 174 LPC-FILE! SP15 174 CURV-FILE! PT15
 17 175 LPC-FILE! SP16 175 CURV-FILE! PT16
 18 176 LPC-FILE! SP17 176 CURV-FILE! PT17
 19 177 LPC-FILE! SP18 177 CURV-FILE! PT18
 20 178 LPC-FILE! SP19 178 CURV-FILE! PT19
 21 179 LPC-FILE! SP20 179 CURV-FILE! PT20
 22
 23 -->
```

```
SCR #111
  0 ( CONTINUED )
  1 180 LPC-FILE! SP21 180 CURV-FILE! PT21
  2 181 LPC-FILE! SP22 181 CURV-FILE! PT22
  3 182 LPC-FILE! SP23 182 CURV-FILE! PT23
  4 183 LPC-FILE! SP24 183 CURV-FILE! PT24
  5
  6 -->
  7
  8
  9
 10
 11
 12
 13
 14
 15
 16
 17
 18
 19
 20
 21
 22
 23


SCR #112
  0 ( TABLES OF STARTING ADDR'S )
  1 CREATE SPS  ( TABLE OF SPEECH FILES )
  2 ' SP1 , ' SP2 , ' SP3 , ' SP4 ,
  3 ' SP5 , ' SP6 , ' SP7 , ' SP8 ,
  4 ' SP9 , ' SP10 , ' SP11 , ' SP12 ,
  5 ' SP13 , ' SP14 , ' SP15 , ' SP16 ,
  6 ' SP17 , ' SP18 , ' SP19 , ' SP20 ,
  7 ' SP21 , ' SP22 , ' SP23 , ' SP24 ,
  8
  9
 10
 11
 12 CREATE PTS ( TABLE OF PITCH CURVES )
 13 ' PT1 , ' PT2 , ' PT3 , ' PT4 ,
 14 ' PT5 , ' PT6 , ' PT7 , ' PT8 ,
 15 ' PT9 , ' PT10 , ' PT11 , ' PT12 ,
 16 ' PT13 , ' PT14 , ' PT15 , ' PT16 ,
 17 ' PT17 , ' PT18 , ' PT19 , ' PT20 ,
 18 ' PT21 , ' PT22 , ' PT23 , ' PT24 ,
 19
 20
 21
 22
 23
```

YAMAHA DX100 VOICE/FUNCTION DATA

DATA NAME : Voices 1

DATE :

NUMBER :

PROGRAMMER :

ALGORITHM	FEEDBACK	LFO WAVE	LFO SPEED	LFO DELAY	LFO PMD	LFO AMD	LFO SYNC	MODULATION SENSITIVITY PITCH	MODULATION SENSITIVITY AMPLITUDE	MODULATION SENSITIVITY EG BIAS	KEY VELOCITY
2	5	tri.	34	19	9	0	off	6	0		
1	2	3	4	5	6	7	8	9	10	11	12

OP	AME		
4	0	0	0
3	0	0	0
2	0	0	0
1	0	0	0

OP	OSCILLATOR FREQ RATIO	OSCILLATOR DETUNE	ENVELOPE GENERATOR AR	ENVELOPE GENERATOR D1R	ENVELOPE GENERATOR D1L	ENVELOPE GENERATOR D2R	ENVELOPE GENERATOR RR	OPERATOR OUT LEVEL	KEYBOARD SCALING RATE	KEYBOARD SCALING LEVEL	TRANSPOSE
4	10.38	+3	19	18	10	4	4	49	0	58	C=C3
3	6.92	-3	21	14	9	6	10	52	0	99	
2	1.0	-3	11	31	15	3	10	64	0	86	
1	1.0	+3	31	7	5	13	15	95	0	0	
	13	14	15	16	17	18	19	20	21	22	23	24

POLY/MONO	PITCH BEND RANGE	PORTAMENTO MODE	PORTAMENTO TIME	FOOT SW ASSIGN	WHEEL RANGE PITCH	WHEEL RANGE AMPLITUDE	BREATH RANGE PITCH	BREATH RANGE AMPLITUDE	BREATH RANGE PITCH BIAS	BREATH RANGE EG BIAS
Mono	2	Fing.	7	Sus.	50	0	0	0	50	0

YAMAHA DX100 VOICE/FUNCTION DATA

DATA NAME : "STRINGS" FOR MINDPOWER

DATE :

NUMBER :

PROGRAMMER :

1 ALGORITHM	2 FEEDBACK	LFO 3 WAVE	LFO 4 SPEED	LFO 5 DELAY	LFO 6 PMD	LFO 7 AMD	LFO 8 SYNC	MODULATION SENSITIVITY 9 PITCH	MODULATION SENSITIVITY 10 AMPLITUDE	MODULATION SENSITIVITY 11 EG BIAS	12 KEY VELOCITY
3	7	TRI	33	14	42	∅	OFF	4	0		

OP	AME	
4	0	0
3	0	0
2	0	0
1	0	0

OP	13 FREQ RATIO	14 DETUNE	ENVELOPE GENERATOR 15 AR	ENVELOPE GENERATOR 16 D1R	ENVELOPE GENERATOR 17 D1L	ENVELOPE GENERATOR 18 D2R	ENVELOPE GENERATOR 19 RR	OPERATOR 20 OUT LEVEL	KEYBOARD SCALING 21 RATE	KEYBOARD SCALING 22 LEVEL	23 TRANSPOSE	24
4	2.0	+1	31	11	13	0	5	75	1	23	C=C2	
3	4.0	0	29	31	15	0	5	70	1	20		
2	6.0	-2	29	31	15	0	4	64	1	34		
1	4.0	0	10	31	15	0	6	90	1	0		

24 POLY/MONO	23 PITCH BEND RANGE	PORTAMENTO 22 MODE	PORTAMENTO 21 TIME	20 FOOT SW ASSIGN	WHEEL RANGE 19 PITCH	WHEEL RANGE 18 AMPLITUDE	BREATH RANGE 17 PITCH	BREATH RANGE 16 AMPLITUDE	BREATH RANGE 15 PITCH BIAS	BREATH RANGE 14 EG BIAS
MONO	2	Fing.	24	SUS	50	0	50	0	50	0

YAMAHA DX100 VOICE/FUNCTION DATA

DATA NAME : "MONO BASS" FOR MINDPOWER

DATE :

NUMBER :

PROGRAMMER :

										AME			OP
4	6	TRI	28	0	6	0	off	6	0	0	0	0	4
										0	0	0	3
										0	0	0	2
										0	0	0	1
ALGORITHM	FEEDBACK	WAVE	SPEED	DELAY	PMD	AMD	SYNC	PITCH	AMPLITUDE	EG BIAS		KEY VELOCITY	
		LFO						MODULATION SENSITIVITY					
1	2	3	4	5	6	7	8	9	10	11		12	

OP												
4	0,5	0	31	13	11	25	8	63	0	0	C=C1	
3	0.5	-3	31	10	11	15	8	81	1	0		
2	0.5	+3	31	9	0	0	8	60	1	0		
1	0.5	0	31	8	0	0	8	99	1	0		
	FREQ RATIO	DETUNE	AR	D1R	D1L	D2R	RR	OUT LEVEL	RATE	LEVEL	TRANSPOSE	
	OSCILLATOR		ENVELOPE GENERATOR					OPERATOR	KEYBOARD SCALING			
	13	14	15	16	17	18	19	20	21	22	23	24

POLY/MONO	PITCH BEND RANGE	PORTAMENTO		FOOT SW ASSIGN	WHEEL RANGE		BREATH RANGE			
		MODE	TIME		PITCH	AMPLITUDE	PITCH	AMPLITUDE	PITCH BIAS	EG BIAS
mono	2	Fing.	65	sus.	50	0	50	0	50	0