CHANNEL SELECT SWITCH
U.S.A. ONLY

To T.V.

MODULATOR

Fr 3 Fr 1 UK 1 USA 2 Fr 2 USA 3 UK 2

SW

0V +5V

R2 680Ω

IC1
SINCLAIR
COMPUTER
LOGIC

CERAM OSC

RAMCS. RD HALT IORQ NM1 MREQ WR MI

TV/TAPE

KBD Ø KBD 1 KBD 2 KBD 3 KBD 4

D9 R32 USA ONLY USA ONLY

USA R31 ONLY

Fr ONLY R32 Fr ONLY D9

Fr ONLY R31 C11 47nF 1K R27 R29 1M C12 47pF

MIC EAR

R33 4K7 C10 10nF

R34 220Ω

TAPE IN USA/UK

ROMCS

R30 USA ONLY

+7V to 11V DC

C3 22µF 16V

REG. 5V REGULATED C4 C2 47nF C8 C9

C7 47pF R6 2K2 100pF C6 not used R3 X1 6.5MHZ

TR2 ZTX313

R5 330Ω +5V Ø CPU

R15 220K C5 1µF 5V

R4 18K

RP1 10K ×7

IC3
Z80A
CPU

C1 47pF R1 10K TR1 ZTX313 +5V R17 1K

BUSRQ R16 1K

BUSAK RFSH

EDGE CONNECTOR

1B 5V 9V KEYWAY 0V Ø A0 A1 A2 A3 A15 A14 A13 A12 A11 A10 A9 A8 A7 A6 A5 A4 ROM CS. 23B UNDERSIDE

1A D7 RAM CS. KEYWAY D0 D1 D2 D6 D5 D3 D4 INT NMI HALT MREQ IORQ RD WR BUSAK WAIT BUSRQ RESET MI RFSH 23A COMPONENT SIDE

IC4b 2114 1K×4 RAM

IC4a 2114 1K×4 RAM

IC4 4118 1K×8 RAM
WILL ALSO ACCEPT 4816 2K×8 RAM IN 28 PIN PACK EXTRA PINS SHOWN CIRCLED

N.B. IC4a & IC4b are an alternative to IC4

N.B. L1 used for 1K RAM
L2 used for 2K RAM

IC2
8K ROM

R28 680Ω

R26 1K R18 1K R19 1K R25 1K R24 1K R23 1K R20 1K R21 1K R22 1K

RP2 NOT USED

A8 A9 A10 A11 A12 A13 A14 A15
D6 D4 D2 D1 D3 D5 D7 D8

RP3 10K ×5

1 2 3 4 5 6 7 8 9 Ø
Q W E R T Y U I O P
A S D F G H J K L ⏎
sh Z X C V B N M . sp

DRW No. SRC 049

SINCLAIR ZX81