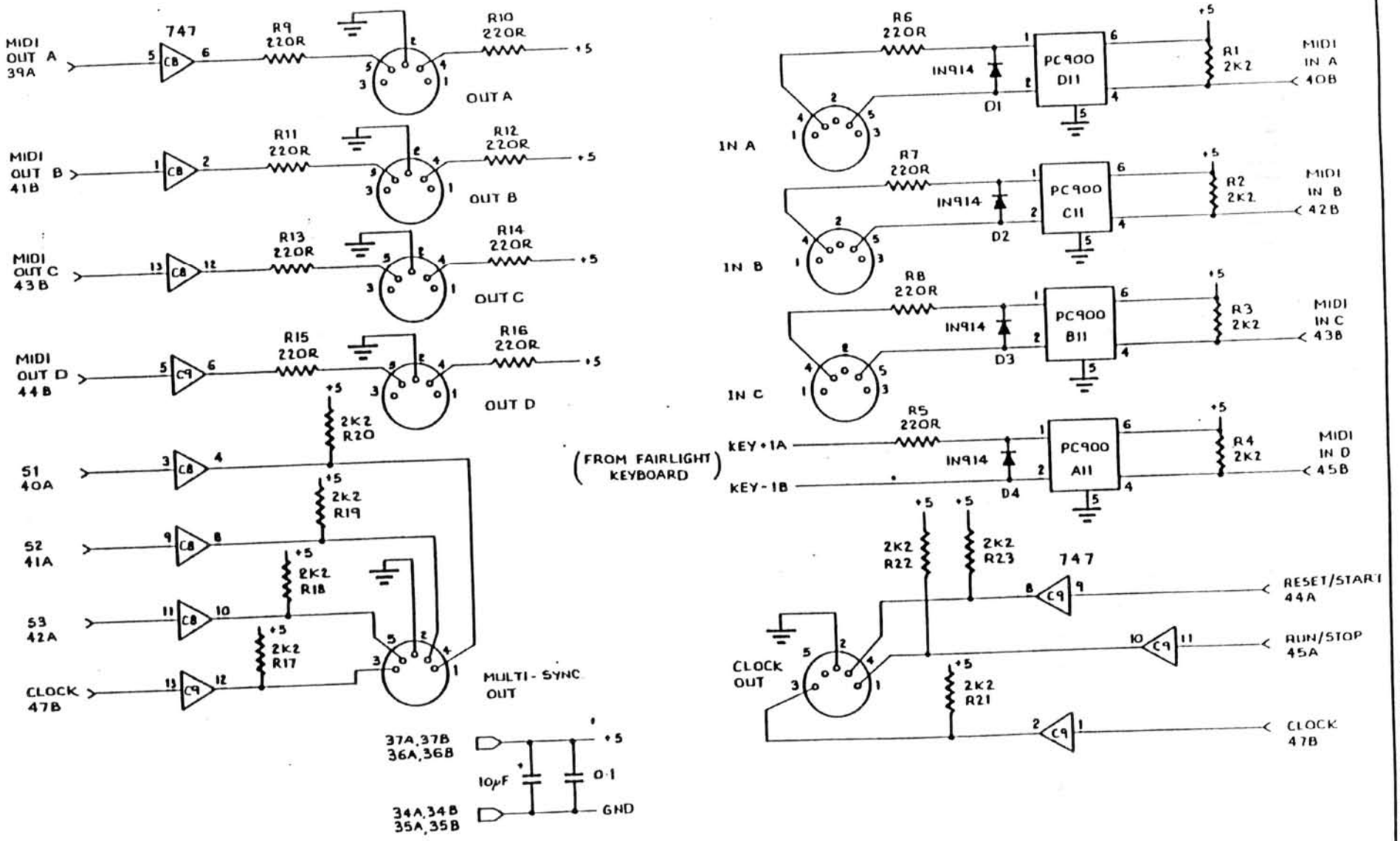
CMI-332

MIDI MODULE

MI-332 MIDI Support Card

This circuit board contains the analog circuitry required for the O for MIDI. There are 3 MIDI inputs (A, B & C) and 4 MIDI itputs (A, B, C & D) all through DIN sockets. There is provision for fourth MIDI input (D), this connects to the 9-way cable to the airlight keyboard. The MIDI I/O circuitry is the standard current op drivers (open-collector buffers 7407 (C8,C9) and receivers (fast oto-couplers PC900 (A11,B11,C11,D11)).

There are two other output (5-pin DIN) sockets. One is the CLOCK itput, containing the CLOCK, RESET/START and RUN/STOP TTL ompatible signals. This CLOCK output is designed to control Roland rum machines, etc. The other is the multiple SYNC output. A click - sync signal received through the CLICK input is fed to the 68B40 imers (see above). The outputs are connected to the DIN socket riven by open-collector buffers. You will notice that the SYNC out 4 gnal is the same as that of the CLOCK and of CLICK out.



NOTES: INPUT SOCKETS ARE SHOWN LOOKING AT FACE OF THE CONNECTOR BODY
OUTPUT SOCKETS ARE SHOWN LOOKING AT REAR OF CONNECTOR BODY.

0·1 DECOUPLERS TO BE PLACED NEAR EACH I.C.

Drivers and Sockets
MIDI

DRAWN: PF REVISION: 1

Pin Connections for the 26-way Connector

(between the CMI-28 and CMI-332 and CMI-333)

Pin 1 MIDI out A.
Pin 2 +5 volts.
Pin 3 MIDI in A.
Pin 4 SYNC out 1.
Pin 5 MIDI out B.
Pin 6 SYNC out 2.
Pin 7 MIDI in B.
Pin 8 SYNC out 3.
Pin 9 MIDI out C.
Pin 10 Digital Ground.
Pin 11 MIDI in C.
Pin 12 Digital Ground.
Pin 13 MIDI out D.
Pin 14 RESET/START.
Pin 15 MIDI in D.
Pin 16 RUN/STOP.
Pin 17 SMPTE code in.
Pin 18 Digital Ground.
Pin 19 SMPTE code out.
Pin 20 CLICK out; SYNC out 4.
Pin 21 CLICK in.
Pin 22 (CMI332-3) Analog Ground.# (CMI28) n/c.*
Pin 23 (CMI332-3) +15 volts.# (CMI28) CPU Halt switch.*
Pin 24 (CMI332-3) -15 volts.# (CMI28) Digital Ground.*
Pin 25 (CMI332-3) n/c.# (CMI28) CPU Reset switch.*
Pin 26 (CMI332-3) n/c.# (CMI28) Digital Ground.*

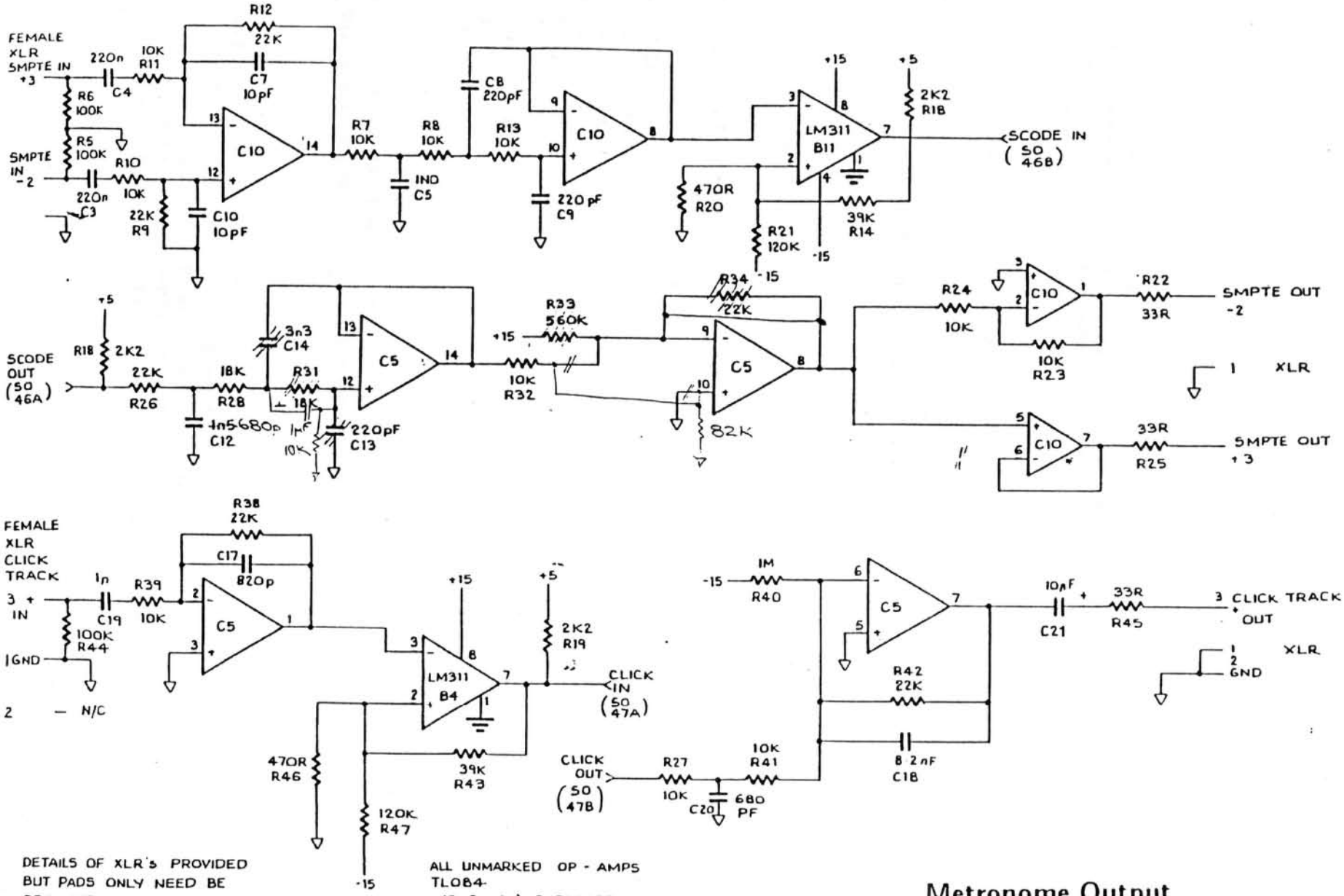
Notes:

 # - these connections are on Audio Rack only.

*** - these connections (from the CMI28 board only) are for debugging purposes only. If two push-button switches are connected between pins 23 & 24 and pins 25 & 26, they can be used to manually halt and reset the 68K processor, respectively.**

CMI-333

SMPTE MODULE



DETAILS OF XLR's PROVIDED BUT PADS ONLY NEED BE PROVIDED AS THESE ARE MOUNTED ON FRONT PANEL. (NOTE PADS ARE NEEDED FOR GND).

ALL UNMARKED OP - AMPS TL084-
+15 PIN 4 } BYPASSED
-15 PIN 11 } TO AGND

Metronome Output

DRAWN: PF REVISION: 1

Introduction

The SMPTE input has a balanced line receiver. The signal is then filtered and converted to TTL compatible signals through the LM311 comparator. The SMPTE out signal is converted from a TTL to a balanced line signal. The SMPTE in and out signals are received and transmitted via two 3-pin XLR sockets.

Pin Connections for the 26-way Connector

(between the CMI-28 and CMI-332 and CMI-333)

Pin 1 MIDI out A.
Pin 2 +5 volts.
Pin 3 MIDI in A.
Pin 4 SYNC out 1.
Pin 5 MIDI out B.
Pin 6 SYNC out 2.
Pin 7 MIDI in B.
Pin 8 SYNC out 3.
Pin 9 MIDI out C.
Pin 10 Digital Ground.
Pin 11 MIDI in C.
Pin 12 Digital Ground.
Pin 13 MIDI out D.
Pin 14 RESET/START.
Pin 15 MIDI in D.
Pin 16 RUN/STOP.
Pin 17 SMPTE code in.
Pin 18 Digital Ground.
Pin 19 SMPTE code out.
Pin 20 CLICK out; SYNC out 4.
Pin 21 CLICK in.
Pin 22 (CMI332-3) Analog Ground.# (CMI28) n/c.*
Pin 23 (CMI332-3) +15 volts.# (CMI28) CPU Halt switch.*
Pin 24 (CMI332-3) -15 volts.# (CMI28) Digital Ground.*
Pin 25 (CMI332-3) n/c.# (CMI28) CPU Reset switch.*
Pin 26 (CMI332-3) n/c.# (CMI28) Digital Ground.

Notes:

 # - these connections are on Audio Rack only.

*** - these connections (from the CMI28 board only) are for debugging purposes only. If two push-button switches are connected between pins 23 & 24 and pins 25 & 26, they can be used to manually halt and reset the 68K processor, respectively.**