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Operating Instructions
For Model ___313ABC___
___HEAD-ON___
___GREMLIN___

	SL2			START 2			SR2			5V	
	x			x	x		x				
LLP	SL1	SL5	SL3	LRP		RLP	SR1	SR5	SR3	RRP	ON OFF
					START1						
x	x	x	x		x	x	x	x	x		x
		SL4						SR4			
		x						x			
	SL6		SL7		COIN		SR6		SR7		POWER
	x		x		x		x		x	x	
											ON OFF

1. Insert 313B card in TF-650 "B" port, number side up.

2. Insert 313A card in TF-650 "A" port, number side up.

3. Insert 313C card in TF-650 "C" port, number side up.

4. Connect cables from "C" card to HEAD-ON board.

    10 pin molex (5 wires) to power connector
     8 pin molex (2 wires) to video connector
    10 pin molex (7 wires) to P-1 connector
    15 pin molex (5 wires) to coin door connector.

5. Turn on 5VDC and then power switch on TF-650.

6. Controls are as follows:

    Coin - COIN
    SR-5 - SPEED

These are screen directions:

    SR-1 - CAR LEFT
    SR-2 - CAR UP
    SR-3 - CAR RIGHT
    SR-4 - CAR DOWN

7. Switch on "A card" (advert) is the advertising switch-This should be in OFF position for test.

8. The COIN LED on "A card" should FLASH each time "COIN" on TF-650 is pushed.

Z80 NOP
Clock 21
Start/Stop 5
GND 29
VCC 0001

1. CPU Signatures per page 18 of Signature II Manual for Z80.

2. The ROM Signatures are for ROMS marked;   163A, 164A, 165A, 166B, 167A, 192A, 193.

CLOCK CPU NOP 21 ⌐
GND   CPU NOP 29   VCC = 8P54
START/ROM pin 20 ⌐   GND   CPU Pin 20
STOP ROM pin 20 ⌐

PIN	SIGNATURE
9	PFA8
10	121P
11	P181
13	35H6
14	FU54
15	U84U
16	FFA0
17	965C
20	8P54

TO CLOCK CONTROLS
GROUND PIN 20 of CPU FOR THIS TEST

Same as ROM connections

SWITCH	U-1	SW OPEN	SW CLOSED
UID on 313A	Pin 16	121P	FAHA
SR-1	5	FFA0	2A83
SR-2	7	965C	2F7C
SR-3	9	FU54	53AF
SR-4	3	U84U	91A7
SR-5	12	35H6	54U8

Coin switch should give a pulse when probe tip is on U71-8 (a high going low when
coin is pushed)