SWITCH MATRIX CIRCUIT

COLUMN	A	B	
INACTIVE	H	L	OFF
ACTIVE	L	H	ON

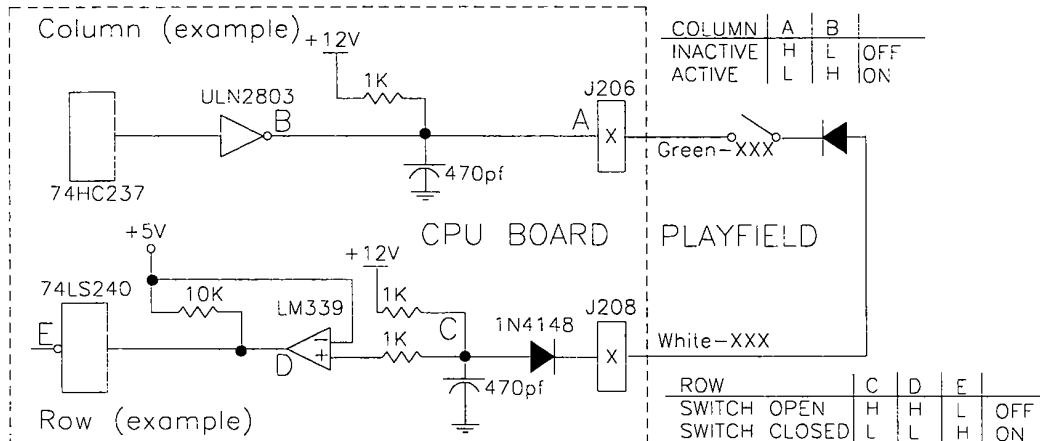| ROW		C	D	E	
SWITCH OPEN		H	H	L	OFF
SWITCH CLOSED		L	L	H	ON

The microprocessor is constantly strobing the column side of the switch. When point "A" on the column circuit toggles low, the column side is active. When a switch closes, the row side of the circuit activates. The "+" input to the LM339 drops below +5V, therefore, its output is low. Corresponding row and column switches must be low at the same time for the switch to be considered closed by the microprocessor. When the switch opens, the "+" input to the LM339 is above +5V, its output is high and the row is inactive.