

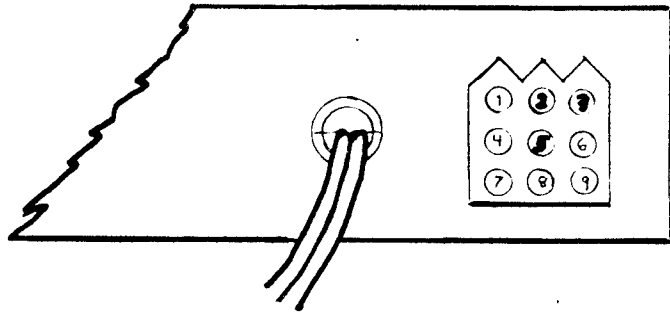
WICO®

6400 W. GROSS POINT ROAD • NILES, ILLINOIS 60648

INSTRUCTION SHEET FOR THE WICO CRT PATTERN GENERATOR Wico No. 72-4461

The Wico CRT Pattern Generator was designed as a test instrument to aid in the repair and alignment of color RGB game monitors. This unit will also test the early B/W monitors with composite video inputs. This unit does not have an RF output and cannot be used on the antenna inputs of a standard TV set.

The Pattern Generator comes equipped with cable assemblies to fit the Electrohome and Wells Gardner RGB color monitors. A cable is also provided for Motorola B/W monitors. This Pattern Generator can be used on most B/W (composite video) monitors by building the appropriate cable assembly. For this reason, a drawing of the output plug pin assignments is shown below.



1. Ground
2. Horz. Sync.
3. Vert. Sync.

4. Red Gun Drive
5. Green Gun Drive
6. Blue Gun Drive

7. 110V AC*
8. 110V AC*
9. Comp. Video (B/W)

* NONISOLATED 110V AC Supply for B/W Monitors

TESTING AN RGB MONITOR

Before testing an RGB monitor, be sure the 110V AC to the monitor is isolated from the AC line by an isolation transformer. Never connect the monitor supply directly to the AC line.

Using the proper cable assembly, connect the tester to the monitor circuit. Be sure the plug is in the proper direction. The Pattern Generator can be plugged directly into the AC line. Allow some time for the monitor to warm up. There are three color switches on the front panel: Red, Blue and Green. With the pattern selector switch set at Pattern 1, turn on each color switch one at a time. The dot pattern should appear on the screen in the proper color selected. No other color should be visible in or around each dot. Now turn all the color switches on. The dots should now be white. Any color around the edges means the monitor is not properly aligned.

If the monitor has passed this first test, the next four test patterns should be used to test for yoke alignment and to see that the horizontal and vertical drive circuits are in proper alignment.

With all three color switches on, turn the selector switch to Pattern 2. The monitor should now have a grid of thin white lines on the screen. Look to be sure that the grid is square on the screen and not rotated. Any rotation means the yoke assembly has moved and must be repositioned according to the manufacturer's instructions. Also note any excessive color separation at the edges of the screen. This can be caused by weak horizontal or vertical amps. See the manufacturer's instructions for the maximum divergence allowed for each set.

The following three Patterns 3, 4 and 5 are used to test that the screen has even intensity across the entire screen. Pattern 5 will light 100% of the screen face. Any faded area may mean that the phosphor has been damaged on the screen. Pattern 5 will also be used to test purity across the entire screen.

BLACK/WHITE MONITOR TEST

In testing a black/white monitor, the red color switch is used to turn the pattern on and off. The same tests for rotation and fading should be performed.

chip list RGB pattern gen.

SN74LS00N

74LS20

SN7425N

2- SN74LS193N

SN74LS08N

SN74LS10N

74LS04

SN74LS160AN

74LS74A PC

SN74LS27N

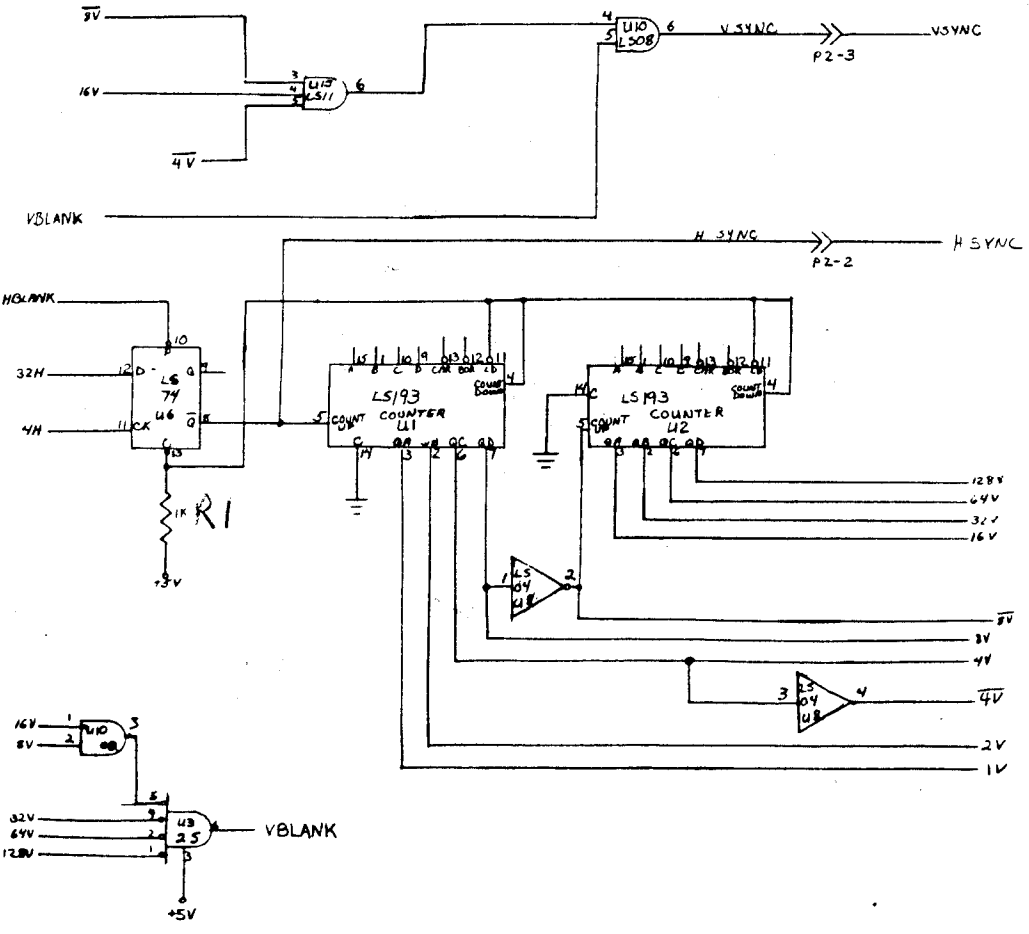
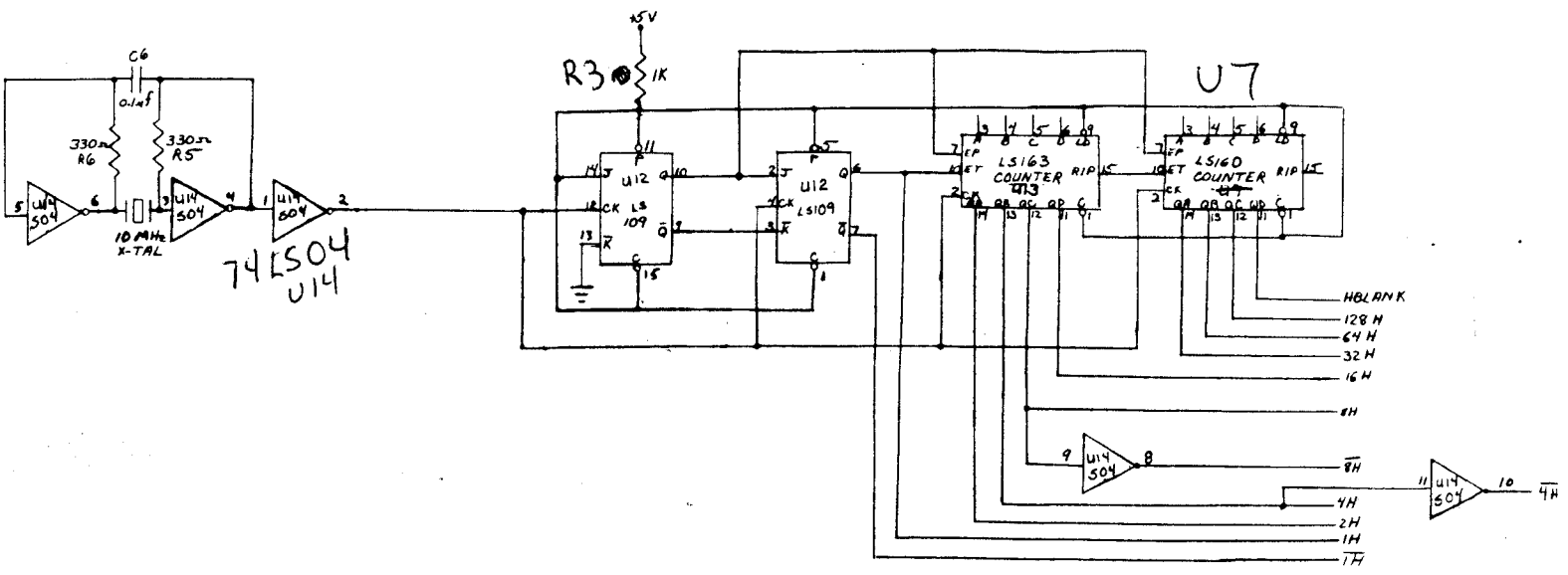
74LS11

DM74S04N

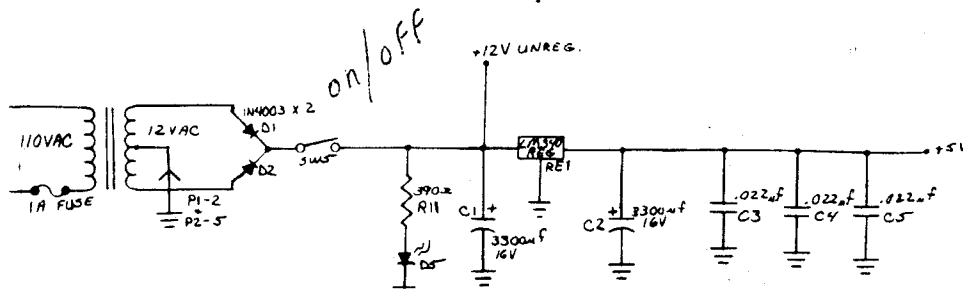
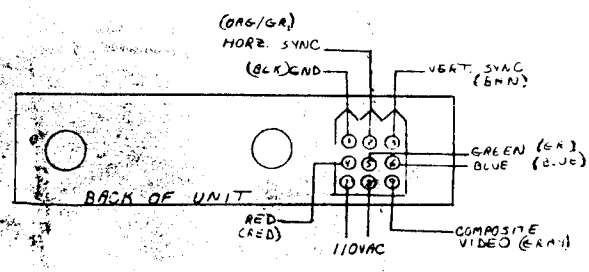
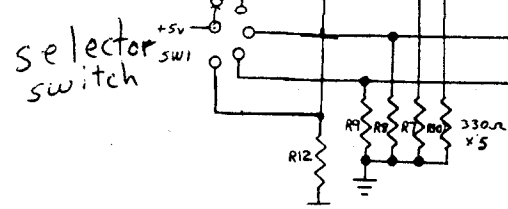
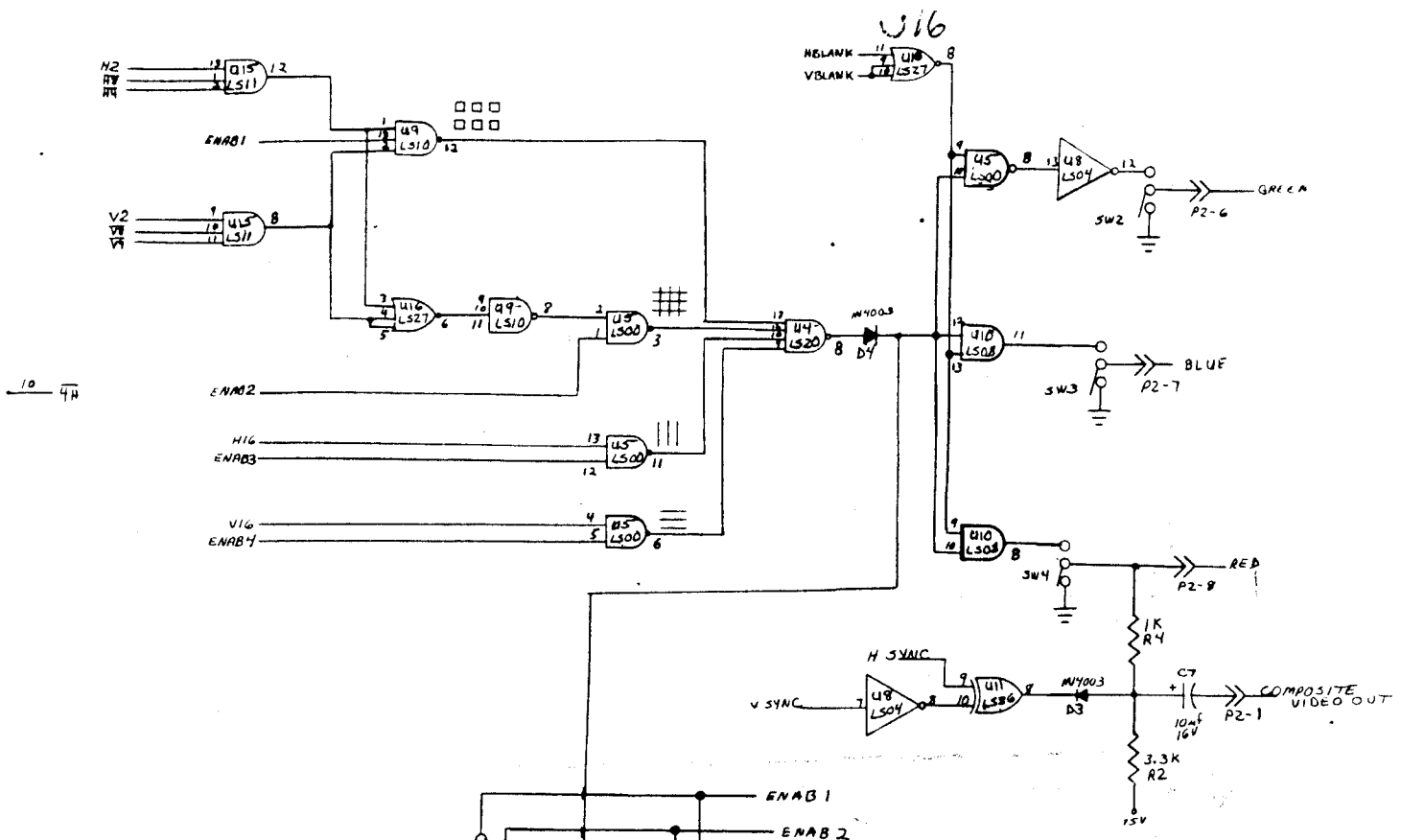
SN74LS163AN

74LS109N

74LS86N



110VAC
1A FU



CRT PATTERN GENERATOR		
SCALE: NONE	APPROVED BY:	DRAWN BY: DG
DATE: 6-5-81		REVISED: 6-5-81
WICO CORP		
REV 6 - 04/812 - PURITY CHECK 10/20/81		REV 5 8/7/81 COMP VIDEO C1ACU-7
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