OSCILLOGRAPH TUBE

MAGNETIC FOCUS

MAGNETIC DEFLECTION

S_FD_V

The 5FP14 is the same as the 5FP7-A except that it utilizes a medium-long-persistence, cascade (two-layer) screen which exhibits purple fluorescence of short persistence and orange phosphorescence which persists for a little over a minute under conditions of adequate excitation and low ambient light.

Because of its medium—long persistence, the 5FP14 is particularly useful where either low— and medium—speed non—recurring phenomena or high—speed recurring phenomena are to be observed. Furthermore, two or more phenomena can be observed simultaneously on the screen by means of a suitable switching arrangement.

The persistence is such that the 5FP14 without filter can be operated with scanning frequencies as low as 30 cycles per second without excessive flicker. When used with yellow filter, such as Wratten No.15 (G), the 5FP14 can be operated with much lower scanning frequencies.

In general, operation of the 5FP14 at an anode voltage below 4000 volts will not give persistence of useable brightness.

THE SPECTRAL-ENERGY EMISSION CHARACTERISTIC and the PERSISTENCE CHARACTERISTIC of the P14 Phosphor are shown at the front of this Section.