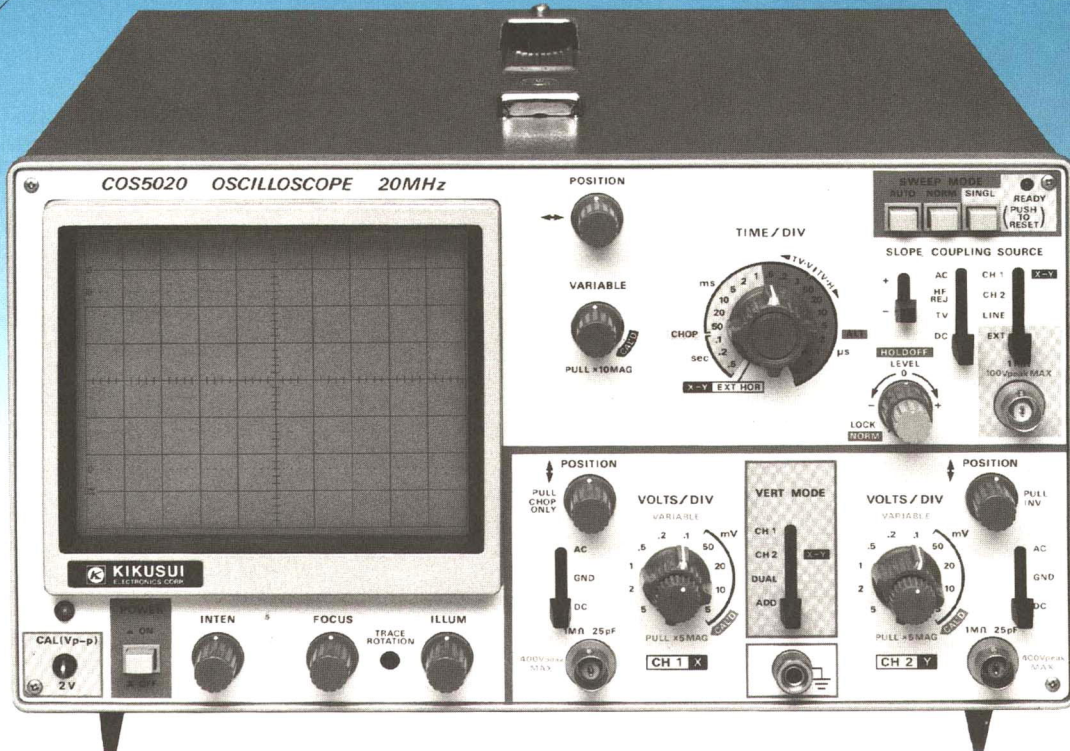


# COS5020 OSCILLOSCOPE

20MHz  
2CH



Designed for production line, education, maintenance and field service use.

- Low cost high performance.
- Compact and easy to operate.

- Hold-off function.
- ADD mode.
- CH1 signal output.

## SPECIFICATIONS

<Vertical Axis >  
**Sensitivity**  
 (with  $\times 5$ MAG.)  
**Frequency response**  
 (with  $\times 5$ MAG.)  
**Rise time**  
**Input impedance**  
**Input coupling mode**  
**Polarity**  
**Operation mode**  
**CHOP frequency**  
**CH1 output signal**  
 <Horizontal Axis >  
**Sweep time**  
 (with  $\times 10$ MAG.)  
 <X-Y Mode >  
**Mode**  
**Sensitivity**  
**Frequency response**  
**X-Y phase difference**  
 <EXT HOR Mode >  
**<Trigger >**  
**Trigger mode**  
**Trigger source**

1-2-5 sequence, 10 positions  
 5mV/div ~ 5V/div (within  $\pm 3\%$ )  
 1mV/div ~ 1V/div (within  $\pm 5\%$ )  
 DC (AC: 10Hz) ~ 20MHz (-3dB, 8div)  
 DC (AC: 10Hz) ~ 15MHz (-3dB, 8div)  
 17.5ns (20MHz) 23ns (15MHz)  
 1M $\Omega$   $\pm 2\%$ , 25pF  $\pm 2$ pF, Parallel  
 AC, DC, GND  
 Possible for CH2 alone  
 CH1, CH2, DUAL, ADD, X-Y (DUAL automatic switching ALT and CHOP)  
 250kHz approx.  
 50mV/div at 50 $\Omega$   
 1-2-5 sequence, 20 positions  
 0.2 $\mu$ s ~ 0.5s/div (within  $\pm 3\%$ )  
 20ns ~ 50ms/div (within  $\pm 5\%$ )  
 CH1: X axis  
 5mV ~ 5V/div  
 DC ~ 2MHz  
 3 $^\circ$  or less (DC ~ 50kHz)  
 Trace swept by an external horizontal signal applied to the EXT TRIG IN terminal. Vertical axis modes are CH1, CH2, DUAL and ADD modes in the CHOP mode.  
 AUTO, NORM, SINGLE  
 CH1, CH2, LINE, EXT

**Coupling mode**  
**Polarity**  
 <Z Axis >  
**Sensitivity**  
**Frequency response**  
**Input resistance**  
 <Calibration Voltage >  
**Waveform**  
**Output voltage**  
 <CRT >  
**Fluorescent screen**  
**Acceleration voltage**  
**Effective area**  
**<Power Requirements >**  
**AC line voltages**  
**Frequency**  
**Power consumption**  
 <Dimensions >  
 (Max.)  
**<Operating Temperature >**  
**<Weight >**  
**<Accessory Supplied >**

AC, HF REJ, DC, TV  
 "+" and "-"  
 3Vp-p (Trace becomes brighter with negative input signal)  
 DC ~ 5MHz  
 5k $\Omega$  approx.  
 Square wave, 1kHz approx.  
 2V  $\pm 3\%$   
 6-inch rectangular, internal graticule  
 P31  
 2.2kV approx.  
 8  $\times$  10div (1div = 10mm)  
 Quick-change line voltage selector, 100V, 115V, 215V, 230V  $\pm 10\%$   
 50/60Hz  
 35VA approx.  
 280W  $\times$  150H  $\times$  370Dmm/  
 11.0W  $\times$  5.91H  $\times$  14.6D inch  
 285W  $\times$  180H  $\times$  440Dmm/  
 11.2W  $\times$  6.9H  $\times$  17.3D inch  
 5 $^\circ$ C ~ 35 $^\circ$ C  
 7.1kg approx./15.4 lbs  
 2 probes P060-S