

## MK 5030-5031

### DESCRIPTION:

- Hours, minutes, seconds, data
- Oscillator inverter for 32,768 Hz quartz crystal
- Direct segment drive
- Operation from 2.7 to 3.4 volts
- Microwatt power dissipation

### FEATURES:

The MK 5030 and MK 5031 are single-chip, ion-implanted, metal gate CMOS circuits for multiplexed four-digit LED display watches. The MK 5030 is for 12-hour timekeeping and the MK 5031 for 24-hour timekeeping. On-chip pull up resistors and debounce circuitry allow the use of simple normally open "close-to-case" input switches. Two switches are used for commanding the display and in conjunction with a third switch for time setting. The setting of minutes does not disturb the hours; and the setting of hours does not disturb the date. Low resistance segment drivers eliminate the need for seven external bipolar transistors.

### CMOS LED WATCH

