

temperature.

Ear-Based Temperature Sensor

Although this is frequently used in pediatric settings (especially ambulatory clinics), debate continues on the reliability of ear-based thermometry in screening febrile children.

Most models use “offsets” for internal calculations that transform ear temperature into supposedly equivalent oral or rectal temperatures.

Ear Sensor (LighTouch LTX)

This measures the infrared heat energy radiating from canal opening, scans canal for highest temperature reading, and then calculates arterial temperature (correlates highly with core or internal body temperature).

It is available in two sizes; the smaller size of LighTouch Pedi-Q is for infants and toddlers.

Axillary Sensor (LighTouch LTN)

This measures the infrared heat energy radiating from the axilla.

It can be used on wet skin; in incubators; or under radiant heaters, warming pads, or other heat sources.

Digital Thermometer

A probe is connected to a microprocessor chip, which translates signals into degrees and sends temperature measurement to digital display.

It is used like an oral electronic thermometer and can be used for measuring oral, rectal, and axillary temperature.

It is more accurate and easier to read but somewhat more expensive than a plastic strip thermometer.