

# Virtual Monitoring of Electrical Circuitry

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**Abstract** — The use of virtual instruments has a very important role in both specialized laboratories and academic ones. Because it is a modern method, it provides increased comfort in monitoring electrical circuits in the long term, as well as reduced costs of implementing and developing laboratories. This paper deals with the efficiency of virtual instruments in monitoring electrical circuits as compared to that of conventional devices. The built equipment can measure three physical measures in real time and offers graphical representations for each value. This also offers a new perspective on new trends in didactic methodology for pupils.

**Keywords** — virtual instrument; electrical measures; electrical circuits; Arduino Uno

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