

Letters to the Editor

A New Method to Record an ECG With a Smartwatch in Newborns and Young Children



To the Editor:

Leroux et al. should be congratulated for their recent article in the *Canadian Journal of Cardiology*,¹ showing the feasibility of recording smartwatch electrocardiograms (ECGs) in newborns and young children. They recorded 2 leads in each case: the conventional lead I following the instructions of the smartwatch and a precordial lead (actually a CR lead) using our method,² placing the back of the watch in the precordium and touching the crown with the child's right-hand finger. In the reported cases, the ECG is of good quality to obtain a diagnosis.

We have proposed a method, “the Good Samaritan hand,”³ to record ECGs in noncollaborative patients. The adult grabs the left hand of the child and the back of the watch and touches the patient's face with the watch crown (Fig. 1). The adult hand works as a passive wire, connecting the children left hand and the watch. The derivation so obtained (H lead) is quite similar to lead I. The same method—grabbing the right hand and touching the precordium—can be used to obtain a precordial lead. In our experience, this method is very useful in newborns and children.

Although larger studies are required to explore the potential problems of the method (possibility of infection, misuse by parents) and to define the reliability and accuracy of the smartwatches in the pediatric population, there are now more than 50 million ECG-capable smartwatches worldwide. We forecast that their ubiquity could revolutionize our approach to some pediatric patients.

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Figure 1. The Good Samaritan hand electrocardiogram method.

Disclosures

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References

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