Validation and Compliance of a Home Monitoring Device in Pregnancy: Microlife WatchBP Home

Yealin Chung, Annemarie de Greeff, and Andrew Shennan

Maternal & Fetal Research Unit, King’s College London, London, UK

Objective. To assess the accuracy and patient compliance in using a novel home blood pressure monitoring device in high-risk pregnancy. Methods. Device accuracy was assessed according to the British Hypertension Society protocol in 45 pregnant women, including 15 with preeclampsia. Twenty-one high-risk pregnant women used the device in addition to their antenatal care. Results. The device achieved a mean difference ± SD of 0.4 ± 7.3/−0.4 ± 5.5 mmHg (pregnancy) and −2.6 ± 7.0/0.8 ± 4.4 mmHg (preeclampsia) for systolic/diastolic pressure. Eighty-one percent of women did at least 6 measurements/day and all women did at least 2 measurements/week. Conclusion. The Microlife WatchBP Home is accurate for use in pregnancy and increases surveillance in compliant patients.

Keywords Blood pressure, Home monitoring, Preeclampsia, Pregnancy, Validation.