

Office Blood Pressure Monitoring Instructions for health-care professionals

DEVICE

- Use only validated electronic upper-arm cuff device. List of accurate devices at www.stridebp.org.
- Devices taking automated triplicate measurements are preferred.
- Devices for children or pregnant women must be validated specifically in these populations.
- Alternatively, auscultatory devices (hybrid or good quality shock-resistant aneroid) can be used.

CUFF

- Cuff size to fit the individual's arm circumference. Smaller cuff overestimates and larger underestimates BP.
- For electronic devices select cuff size according to the manufacturer's instructions.
- For auscultatory devices the length of inflatable bladder to cover 75-100% of the individual's arm circumference and the width 37-50%.
- Wrap the cuff around bare arm with lower edge 2-3 cm above the elbow crease and mid-point of bladder over the brachial artery.

CONDITIONS

- Quiet room with comfortable temperature.
- No smoking, caffeine, food and exercise 30 min before measurement.
- Empty bladder.
- Sitting rest for 5 min.
- No talking of patient or staff during and between measurements.

POSTURE

- Sitting on chair with back supported.
- Legs relaxed and uncrossed, feet flat on floor.
- Arm resting on table with mid-arm at heart level.

PROCEDURE

- Take 3 BP readings with 1 min intervals (or 2 readings if both low) and average the last 2.
- Measure standing BP in treated hypertensives, when there are symptoms suggesting postural hypotension, particularly in the elderly and in patients with diabetes or neurodegenerative disease.

INTERPRETATION

Office BP (mmHg)	Probable diagnosis	Action
<130/85	Normotension	Remeasure after 1 year (6 months if other risk factors).
130-139/85-89	Masked hypertension	Perform home or ambulatory BP monitoring. If not available confirm with repeated office visits.
140-159/90-99	White-coat hypertension	Perform home or ambulatory BP monitoring. If not available confirm with repeated office visits.
≥160/100	Sustained hypertension	Confirm within a few days or weeks. Ideally use home or ambulatory BP monitoring. Treat immediately if BP is very high (e.g. ≥180/110 mmHg) and there is evidence of target organ damage or cardiovascular disease.