



## Clinical Policy: Automated Ambulatory Blood Pressure Monitoring

Reference Number: HNCA.CP.MP. 262

Effective Date: 4/06

Last Review Date: 01/19

[Coding Implications](#)

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### Description

Ambulatory blood pressure monitoring (ABPM) is determined using a device worn by the patient that takes blood pressure measurements over a 24- to 48-hour period, usually every 15 to 20 minutes during the daytime and every 30 to 60 minutes during sleep. These blood pressures are recorded on the device, and the average day (diurnal) or night (nocturnal) blood pressures are determined from the data by a computer. The percentage of blood pressure readings exceeding the upper limit of normal can also be calculated.<sup>1</sup>

### Policy/Criteria

- I. It is the policy of Health Net of California that automated ambulatory blood pressure monitoring is **medically necessary** for any of the following:
  - A. Suspected white-coat hypertension, when all of the following criteria is met:
    - 1. Office blood pressure measurement > 130/80 mm Hg on at least three separate clinic/office visits with two separate measurements made at each visit, or ;
    - 2. At least two documented blood pressure measurements taken outside the office which are >130/80 mm Hg;
    - 3. No evidence of end-organ damage.
  - B. Suspected episodic hypertension (eg. Pheochromcytoma)
  - C. Hypertension resistant to increasing medications
  - D. Hypotensive symptoms while taking antihypertensive medications
  - E. Autonomic dysfunction

### Background

The primary use of ABPM is for diagnosing patients with suspected white coat hypertension. These patients exhibit higher blood pressure readings in an office, by a physician, as compared to readings obtained outside of the office setting by a “non-physician.” The diagnosis of white coat hypertension (also called isolated clinic or office hypertension) is applied to patients with office readings that average more than 140/90 mmHg and reliable out-of-office readings that average less than 140/90 mmHg.

Therapeutic decisions can be made from the ABPM findings. For those patients that undergo ABPM and have an ambulatory blood pressure of <135/85 with no evidence of end-organ damage, it is likely that their cardiovascular risk is similar to that of normotensives. They should be followed over time. Patients for which ABPM demonstrates a blood pressure of >135/85 may be at increased cardiovascular risk, and a physician may wish to consider antihypertensive therapy



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#### *United States Preventive Services Task Force (USPSTF)*

The USPSTF recommends screening for high blood pressure in adults aged 18 years or older. They recommend annual screening for adults aged 40 years or older and for those who are at increased risk for high blood pressure. Per the USPSTF, screening for high blood pressure may be done in the office setting, however, they recommend confirmation outside of the clinical setting before a diagnosis of hypertension is made and treatment is started. ABPM and home blood pressure monitoring (HBPM) may be used to confirm a diagnosis of hypertension after initial screening. Because blood pressure is a continuous value with natural variations throughout the day, repeated measurements over time are generally more accurate in establishing a diagnosis of hypertension. The USPSTF did not find evidence for a single gold standard protocol for HBPM or ABPM, however, they noted both may be used in conjunction with proper office measurement to make a diagnosis and guide management and treatment options. The USPSTF recommends ABPM as the reference standard for confirming the diagnosis of hypertension.

American College of Cardiology guidelines (2017) note the following:

It is critical that health care providers follow the standards for accurate BP measurement. BP should be categorized as normal, elevated, or stages 1 or 2 hypertension to prevent and treat high BP. Normal BP is defined as  $<120/<80$  mm Hg; elevated BP  $120-129/<80$  mm Hg; hypertension stage 1 is  $130-139$  or  $80-89$  mm Hg, and hypertension stage 2 is  $\geq 140$  or  $\geq 90$  mm Hg. Prior to labeling a person with hypertension, it is important to use an average based on  $\geq 2$  readings obtained on  $\geq 2$  occasions to estimate the individual's level of BP. Out-of-office and self-monitoring of BP measurements are recommended to confirm the diagnosis of hypertension and for titration of BP-lowering medication, in conjunction with clinical interventions and telehealth counseling. Corresponding BPs based on site/methods are: office/clinic  $140/90$ , HBPM  $135/85$ , daytime ABPM  $135/85$ , night-time ABPM  $120/70$ , and 24-hour ABPM  $130/80$  mm Hg. In adults with an untreated systolic BP (SBP)  $>130$  but  $<160$  mm Hg or diastolic BP (DBP)  $>80$  but  $<100$  mm Hg, it is reasonable to screen for the presence of white coat hypertension using either daytime ABPM or HBPM prior to diagnosis of hypertension.

### **Coding Implications**

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| CPT® Codes | Description   |
|------------|---|
| 93784      | Ambulatory blood pressure monitoring, utilizing a system such as magnetic tape and/or computer disk, for 24 hours or longer; including recording, scanning analysis, interpretation and report. |
| 93786      | Ambulatory blood pressure monitoring, utilizing a system such as magnetic tape and/or computer disk, for 24 hours or longer; recording only   |
| 93788      | Ambulatory blood pressure monitoring, utilizing a system such as magnetic tape and/or computer disk, for 24 hours or longer; scanning analysis with report                                      |
| 93790      | Ambulatory blood pressure monitoring, utilizing a system such as magnetic tape and/or computer disk, for 24 hours or longer; review with interpretation and report                              |

| HCPCS Codes | Description |
|-------------|-------------|
| N/A         |             |

#### ICD-10-CM Diagnosis Codes that Support Coverage Criteria (may not be an all inclusive list)

| ICD-10-CM Code | Description   |
|----------------|---|
| R03.0          | Elevated blood- pressure reading, without diagnosis |
| I10            | Hypertension (malignant only)                       |
| I11.9          | Hypertensive heart disease without heart failure    |
| I15.0 - I16.2  | Secondary hypertension [malignant only]             |

| Reviews, Revisions, and Approvals   | Date | Approval Date |
|---|------|---------------|
| Policy adopted from Health Net NMP262 Automated Ambulatory Blood Pressure Monitoring  | 1/17 | 1/17          |
| Revised BP readings from 140/90 to 130/80 based on American College of Cardiology recommendations. Added additional diagnoses based on UpToDate recommendations. References and codes updated | 1/18 | 1/18          |
| Added secondary hypertension codes and updated references   | 1/19 | 1/19          |

#### References

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### **Important Reminder**

This clinical policy has been developed by appropriately experienced and licensed health care professionals based on a review and consideration of currently available generally accepted standards of medical practice; peer-reviewed medical literature; government agency/program approval status; evidence-based guidelines and positions of leading national health professional



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organizations; views of physicians practicing in relevant clinical areas affected by this clinical policy; and other available clinical information. The Health Plan makes no representations and accepts no liability with respect to the content of any external information used or relied upon in developing this clinical policy. This clinical policy is consistent with standards of medical practice current at the time that this clinical policy was approved. “Health Plan” means a health plan that has adopted this clinical policy and that is operated or administered, in whole or in part, by Centene Management Company, LLC, or any of such health plan’s affiliates, as applicable.

The purpose of this clinical policy is to provide a guide to medical necessity, which is a component of the guidelines used to assist in making coverage decisions and administering benefits. It does not constitute a contract or guarantee regarding payment or results. Coverage decisions and the administration of benefits are subject to all terms, conditions, exclusions and limitations of the coverage documents (e.g., evidence of coverage, certificate of coverage, policy, contract of insurance, etc.), as well as to state and federal requirements and applicable Health Plan-level administrative policies and procedures.

This clinical policy is effective as of the date determined by the Health Plan. The date of posting may not be the effective date of this clinical policy. This clinical policy may be subject to applicable legal and regulatory requirements relating to provider notification. If there is a discrepancy between the effective date of this clinical policy and any applicable legal or regulatory requirement, the requirements of law and regulation shall govern. The Health Plan retains the right to change, amend or withdraw this clinical policy, and additional clinical policies may be developed and adopted as needed, at any time.

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**Note: For Medicaid members**, when state Medicaid coverage provisions conflict with the coverage provisions in this clinical policy, state Medicaid coverage provisions take precedence.



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Please refer to the state Medicaid manual for any coverage provisions pertaining to this clinical policy.

**Note: For Medicare members,** to ensure consistency with the Medicare National Coverage Determinations (NCD) and Local Coverage Determinations (LCD), all applicable NCDs, LCDs, and Medicare Coverage Articles should be reviewed prior to applying the criteria set forth in this clinical policy. Refer to the CMS website at <http://www.cms.gov> for additional information.

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