# Hypertension and Health Equity: Putting the Power in the Patient's Hands Through Self-Measured Blood Pressure (SMBP)

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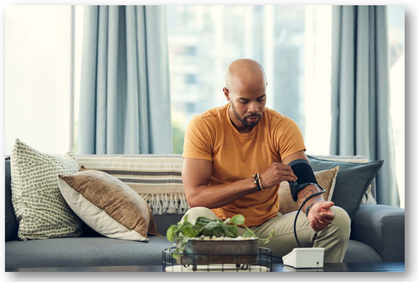
## BACKGROUND

Hypertension or high blood pressure is **more common in non-Hispanic Black adults (56%) than in non-Hispanic white adults (48%)**.[1] Black men have **higher rates of hypertension complications including hypertension-associated death** compared with other populations and are less likely to follow up with primary care physicians or to continue with medical adherence.[2] Hypertension-associated death rates in non-Hispanic Black men are more than 2.5-fold higher than in non-Hispanic White men and almost 1.5-fold higher than in non-Hispanic Black women.[3]



## GOALS OF THE DEMONSTRATION PROJECTS

1. **Increase screening and testing** of Black males at high-risk for hypertension.
2. **Refer, enroll and engage** these men into evidence-based **Self-Measured Blood Pressure (SMBP) monitoring programs with clinical support** and lifestyle change programs.
3. **Address a social determinant of health (SDOH)** identified as a barrier to patient screening, care management, enrollment and/or retention.
4. **Collect and report data** (process and outcome measures) that reflect enrolled patient experiences and assess the impact of SMBP and interventions taken during project period.

**Inclusion Criteria: Black men ages 35-64** identified as having stage 1 hypertension and above, per the 2017 American College of Cardiology/American Heart Association guidelines for hypertension management.[2]

*"I was amazed when swapping a salty breakfast for a vegetable and a fruit smoothie every morning got me at target without adding a third medication."*
**– Patient from Cook County Health**

## PROMISING PRACTICES TO IMPROVE HYPERTENSION

- **Provide cuffs** (appropriate size) and supporting materials (logs, checklist).
- **Engage graduate/medical students/residents** for continuous clinical support.
- **Develop Quality Improvement (QI)** processes and **educate care team members** (e.g., Medical Assistant (MA), Registered Nurse (RN)) on accurate blood pressure (BP) measurement; create **patient & provider checklists.**
- **Utilize population health tools** to identify eligible and lost-to-follow-up patients.
- **Utilize warm hand-off /engagement** through Licensed Practical Nurses (LPN)/social workers/**community health workers (CHW).**
- **Screen/address social needs** after establishing rapport with patients.
- **Conduct in-person lifestyle management classes** to improve understanding of the impact of diet and exercise on hypertension control.

## APPROACHES & INITIAL FINDINGS

COOK COUNTY HEALTH

### Cook County Health (Chicago, IL)

- RN conducts **intake, screen for social needs**; MAs/RNs use **Target BP 7 Tips**
- Refer patients for transportation and food vouchers, M.A.T, substance abuse treatment, utility assistance etc.
- Offer **hypertension and lifestyle management** classes; recognize champions
- Teach **health literacy** related to hypertension
- **Enrolled 119 patients as of Sept 2022**

HENRY FORD HEALTH

### Henry Ford Health (Detroit, MI)

- **Increase synergy between RN BP** Practitioners (medication titration) and **embedded pharmacists** (medication optimization) for identified patients
- **Engage CHW** to follow-up with lost-to follow-up patients and **screens for social needs**
- Refer patients with food insecurity to Henry's Groceries / Food Prescriptions
- **Patients more confident in managing BP**
- Enrolled 348 patients as of Sept 2022, 181 **(52%) are currently at goal**

LINCOLN COMMUNITY HEALTH CENTER
*"Your link to quality health care"*

### Lincoln Community Health Center (Durham, NC)

- **Engage graduate and nursing students** from Duke and North Carolina Central Universities; **conduct outreach** among 250+ eligible men identified each year through HRSA database
- Offer **hypertension classes** include healthy food tasting, videos posted on YouTube
- Screen for social/health harming needs during 3rd call; **identified policy and legal remedies for patients**
- **Black men who attended more than one in-person class** saw **reduction in BP**

THE UNIVERSITY OF ALABAMA® University Medical Center

### University of Alabama Medical Center (Tuscaloosa, AL)

- Utilize LPN/Health coach; engage **Family Medicine residents/medical students** to conduct outreach with eligible men identified by NextGen population health tool
- Offer **hypertension and lifestyle management book** classes; HYPE mobile app to log readings
- Capture patient experience via **Qualtrics**
- **Partner with WellBama health screenings/ 100 Black Men of West Alabama**
- **Conduct Social needs screening** – access to telephone/laptop; loneliness/social support

Grady

### Grady Health System (Atlanta, GA) – participated until July 2021

- Built **hypertension resource bank** to incorporate in EMR and a **database of Black men** with hypertension to be seen in clinics
- **Peer educators** offered **classes in SMBP**
- Developed **nurse-driven protocol** to manage enrollment
- Screened all men using multi-pronged Food As Medicine (FAM); 29% screened positive
- Piloted in three primary clinics **and 272 patients were referred ; 90 completed at least one visit**

## ABOUT THE PROJECT

**With funding from the Centers for Disease Control and Prevention's (CDC) Division for Heart Disease and Stroke Prevention (DHDSP),** The American College of Preventive Medicine (ACPM) awarded grants to **six health care organizations** to develop innovative models within clinical practices **to address hypertension in Black men ages 35-64 years**.

*"It has increased my patient teaching skills and helped me realize the effect of patient's participation in his care."*
**–Nurse at Cook County Health**


## METHODOLOGY/TIMELINE

**Request For Proposals Submission(Feb-April 2019)**

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**Grantees Selected and Start-up Phase (May-July 2019)**

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**Demonstration Projects Launched (August 2019)**

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Six grantees initially funded; faculty provide technical assistance through monthly calls, all-grantee calls, site visits and review of quantitative and qualitative data

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**Demonstration Projects End (August 2023)**

**Four grantees** continue project implementation; All grantees adapted approaches in response to the COVID-19 pandemic and are planning for sustainability and system-based changes beyond the current funding period.

**"We included pill boxes, as a tool to remind patients to take their meds, based on our CHW's suggestion. Patients have found it very useful." – Henry Ford Team**

## REFERENCES

1. A closer look at African American Men and High Blood Pressure www.cdc.gov/bloodpressure/aa_sourcebook.htm
2. 2017 ACC/AHA Hypertension Guidelines https://pubmed.ncbi.nlm.nih.gov/29133356/
3. A Review of Hypertension Management in Black Male Patients - https://www.mayoclinicproceedings.org/article/S0025-6196(20)30050-1/fulltext

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