A Model for Engaging Patients with Hypertension in Self-Measured Blood Pressure Monitoring

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Overview

Scientific evidence supports the use of self-measured blood pressure monitoring (SMBP) for patients with hypertension. Many Community Health Centers (CHC) are interested in engaging patients in their care by starting a SMBP program. While many educational tools are available, there is a lack of information from patients at CHC on their needs associated with managing their hypertension and a set of evidence based materials for use in a SMBP program. A human centered approach was used to partner with patients and care teams using the tool of co-design to develop materials for a SMBP pilot program.

This pilot program included a partnership between a consortia (Health Quality Partners, a subsidiary of Health Center Partners of Southern California), a funder (Center for Care Innovations), two Southern California community health centers, and patients diagnosed with hypertension.



Why Co-Design Sessions?

Co-design sessions are a tool used to:

- create an active partnership with patients.
- challenge assumptions.
- assist with learning what matters to patients and hearing it from them directly.

Your blood pressure is

120-139

Your blood pressure is

chest pain, or have difficulty speaking.

Get plenty of exercise. Try to get at least 30 minutes a day

5 ounces of wine, and 12 ounces of beer).

Keep your weight down. Try eating smaller portions

Have less alcohol. Women: limit to 1 drink per day. Men: limit to 2 drinks per day (1 drink equals 1 ½ ounces of hard alcohol

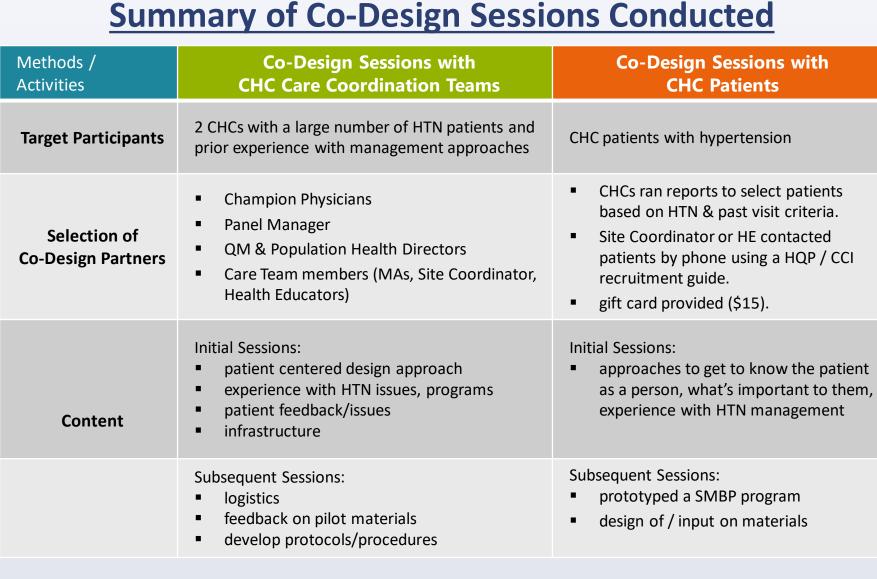
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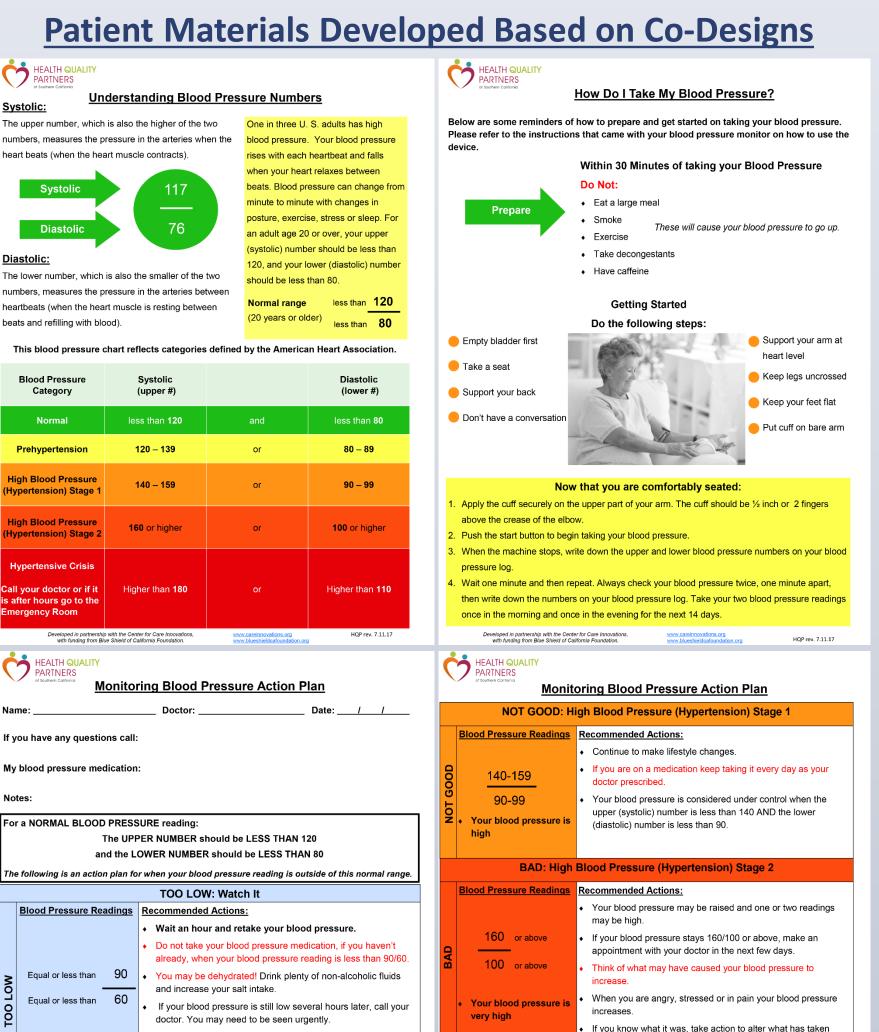
 partner with individuals to identify/solve problems.

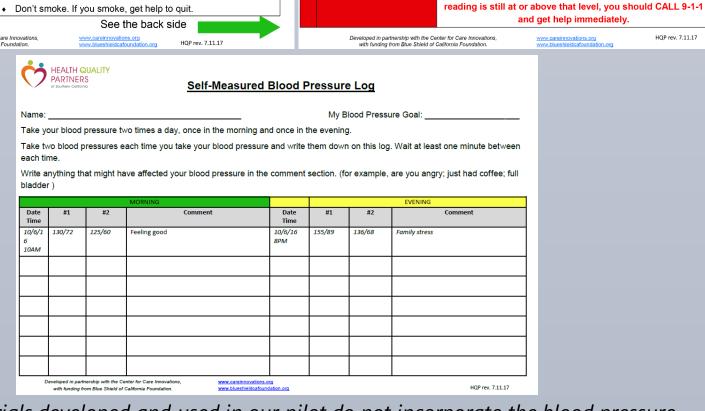
More information on humancentered design can be found at http://www.careinnovations.org.

Co-design sessions were conducted with hypertensive patients to:

- (1) understand their perspective and include their feedback in the design of program materials and;
- (2) procedures needed to take their own blood pressure, understand their readings, and document and act on their results.







place and take your blood pressure an hour later

breath, back pain, numbness/weakness, changes in vision or

difficulty speaking, wait about five minutes and take it again.

f you ARE experiencing any of those symptoms AND your

Note: Materials developed and used in our pilot do not incorporate the blood pressure readings considered "normal" specifically for <u>Self-Measured</u> Blood Pressure.

Materials for managing and tracking self-measured blood pressure monitoring (SMBP) among patients with hypertension were developed and used during the pilot program. These included:

Care Team Materials

- Recruitment protocols / reports
- Pilot consent form
- Checklists for care team members to use during all patient encounters (orientation session, follow-up call and visit)
- Blood pressure (BP) reading log

SMBP Pilot Summary

A 17-day pilot program was conducted with 39 CHC patients that had hypertension using the materials developed through the co-design sessions. The pilot included: (1) an orientation session on Day 1 with each patient and a care team member (consent form signed, SMBP materials & resources distributed, BP monitor provided with demonstration); and (2) a follow-up phone call (Day 8) and visit (Day 17). BP was self-measured by the patient for 14 days with instructions to follow a protocol of two readings in the morning and evening that are one minute apart.

Outcomes of SMBP Pilot

Thirty-nine patients began the pilot. Of these,

- 35 (89.7%) finished all activities.
- 6 (17.1%) had improved BP during the 14 day period.
- 14 (40%) followed the BP protocol of two readings in the AM and PM on all days.
- 22 (62.9%) recorded their BP seven or more days at least once in the morning and evening.

Patients indicated they:

- liked the program & materials.
- learned about behaviors/things that impacted their BP.
- liked the care team member involvement and support.
- enjoyed being heard in the co-design sessions.

Next Steps

While the pilot sample was small, it showed promise for offering a SMBP program to patients within CHC and using co-design as a method of patient engagement. Future work in this area is needed to address resources for providing BP monitors, billing, and inclusion of SMBP data in CHC electronic medical records.