

# Implementing a Hypertension Screening Workflow in a Retail Clinic Setting



JOHNS HOPKINS  
SCHOOL of NURSING

Aderonke Akindipe, MSN, APRN, NP-C & Michelle Felix, DNP, CRNP, MSN

## Background

- Retail clinics (RCs) offer low cost, convenient care for acute minor illnesses and injuries
- It is not uncommon to see patients with elevated blood pressure who have yet to be diagnosed or treated for Hypertension (HTN).
- HTN is a common chronic condition among adults in the United States and is an important risk factor for cardiovascular disease
- 1 in 4 men and 1 in 5 women were diagnosed with hypertension in 2015
- primary care workforce is currently unable to meet the demand for clinic visits to manage patients with chronic disease such as hypertension
- In comparison to the general population, retail clinic patients are more likely to be uninsured or have no primary care provider
- In order to help bridge the gap, clinicians working in retail clinics must be prepared to address elevated blood pressure during an acute visit.

## Objectives

This quality improvement pilot project evaluated the effects of standardized Hypertension screening workflow in the retail clinic setting.

**Aims:** To determine whether a standardized BP screening workflow will:

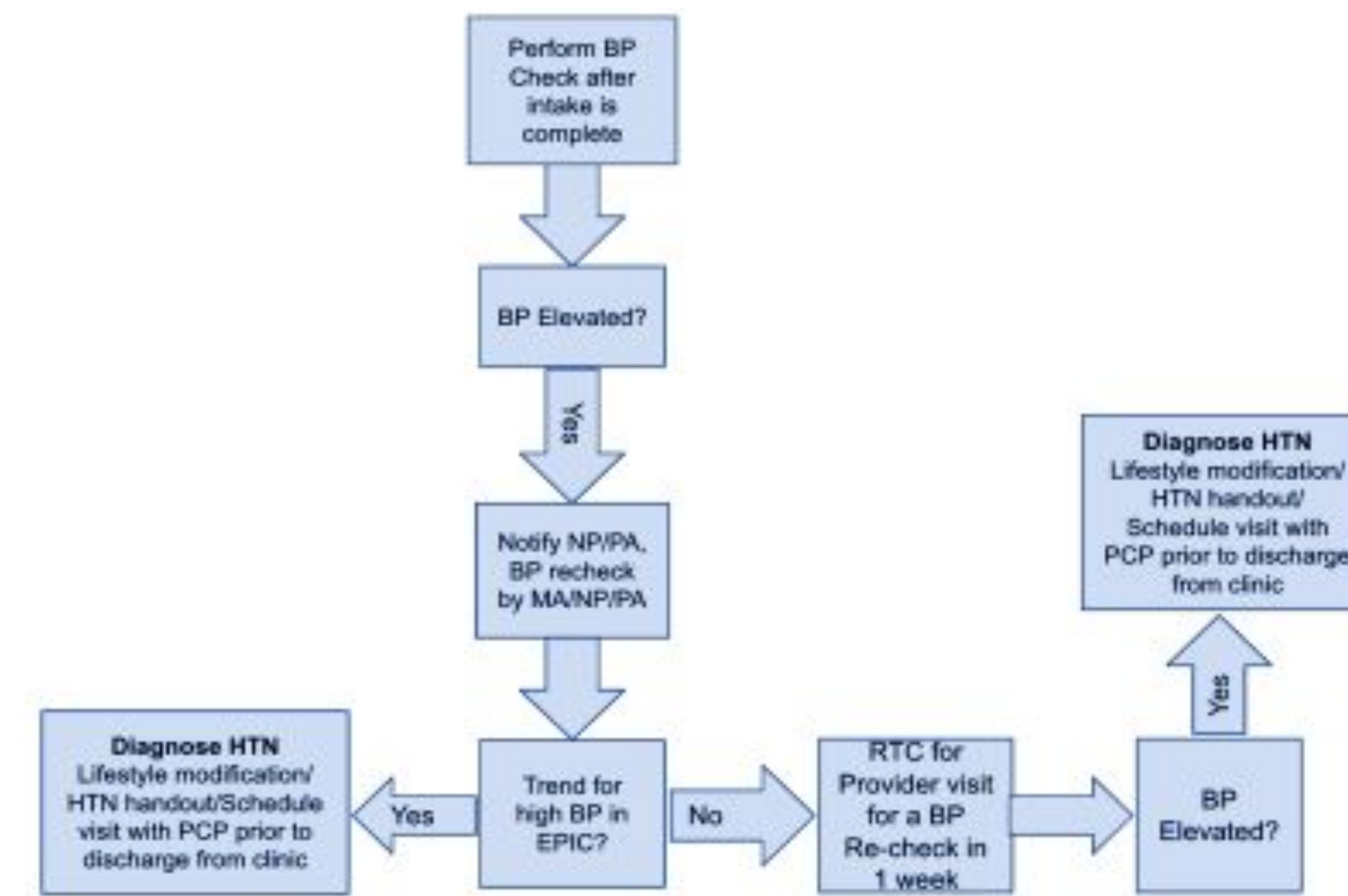
- increase the number of patients with a BP recheck if the first BP > 140/90
- increase the number of patients with a documented treatment and follow up plan of care.
- result in decreased clinic throughput thereby increasing patient wait times at the retail clinic.

## Design

- **Design:** Pre-Post intervention design with different groups
- **Setting:** A retail clinic within a large health system
- **Sample:** convenience sample of 18 charts were reviewed. 4 providers (NP/PA) and MAs.
- **Exclusion:** Patients with BP less than 140/90, Patients with complicated comorbid conditions including ESRD.
- **Timing of Intervention:** September-December 2021
- **Analysis:** Descriptive statistics

Measures	Description	Numerator/Denominator
BP Re-Check	Patients with a chart documentation of a BP recheck after an elevated BP >140/90 mmHg	
Plan of Care	Patients with a chart documentation of plan of care for elevated BP or diagnosis of HTN	
Clinic Throughput	Length of visit for patients seen for a visit with elevated BP or HTN	

## Evidence Based Intervention



- Usual workflow was modified to include blood pressure recheck if the initial blood pressure is > 140/90.
- Modified workflow was adapted from an evidenced based Hypertension Control Provider Toolkit .
- workflow included a standardized BP rechecks, plan of care documentation, patient education material
- A copy of the patient education will include lifestyle modification advice, a blood pressure log for the patient to record blood pressure readings at home, and an individualized BP goal for each patient.

## Sample Demographics

Characteristic	Pre-Intervention n=18	Post-Intervention n=18
<b>Patients</b>		
Age, mean	42	45
Sex, n(%)		
Male	2 (11.1%)	6 (33%)
Female	16 (88.9%)	12 (66.7%)
<b>Providers (Specialty): n (%)</b>		
Primary Care	1(25%)	1(25%)
Urgent Care	3(75%)	3(75%)

## Results

	Pre-Intervention (%)	Post-Intervention (%)
BP recheck	16.7	16.7
Documentation of treatment plan and follow up plan of care	38.9	33.3
Length of visit	13	14

## Findings

BP Re-Check	No change in BP checks
Plan of Care Documentation and Treatment Plan	No statistical difference between groups
Patient Visit Time	No statistical difference between groups

## Discussion & Conclusion

- Results did not show a clinically significant improvement in BP screening and plan of care documentation.
- There was a decrease in blood pressure checks when compared to pre intervention chart reviews.
- Retail Clinic providers cited lack of focus on elevated BP at the height of the global pandemic. Time and resources needed to support this initiative was not a priority for the organization during this time.
- **Limitations:** Implementation during the COVID19 Pandemic surge impacted the availability of time and staffing resources for this project. Retail clinics pivoted to covid19 testing at all sites which impacted the time spent with patients on BP screening and management of high BP.
- **Sustainability:** BP screening initiatives in the retail clinic setting is to ensure frontline staff are empowered and engaged to be able to simultaneously balance and support multiple organizational priorities.