



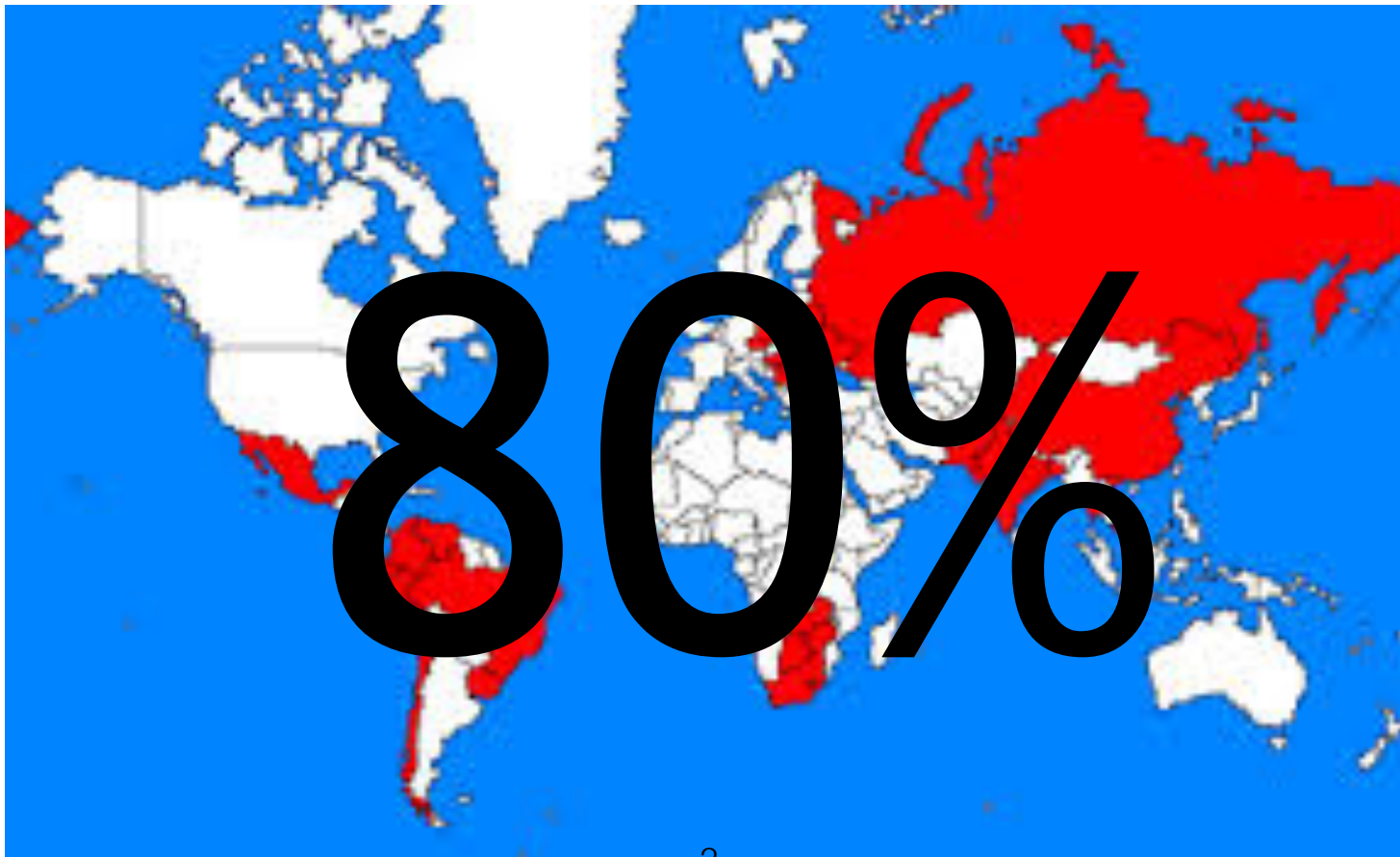
Global Standardized Hypertension Treatment Project

*HCC Health Systems Strengthening
22nd October 2014 Dominica*

*Dr. Kenneth Connell
GSHTP Principal Investigator*

On the current Trajectory. . .

2020



Dollars & Sense??

60%



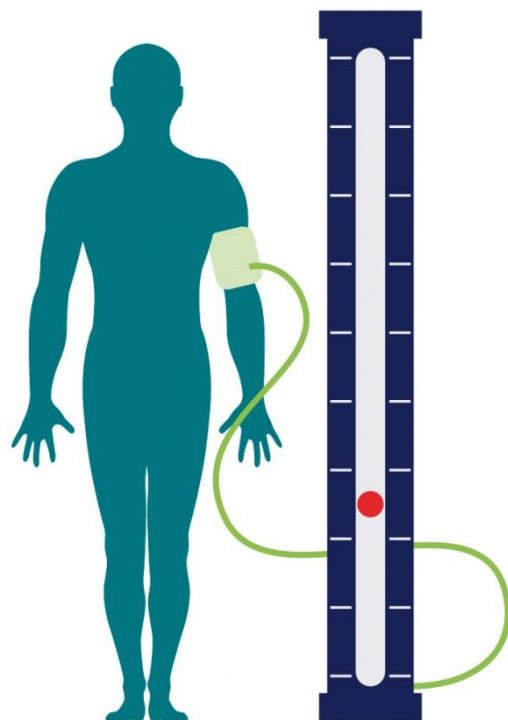
30%

WHO Global Action Plan 2013-14

- “*Strengthening and orienting **health systems** to address the prevention and control of NCDs . . . through **people centred primary health care** . . .*”



**World Health
Organization**

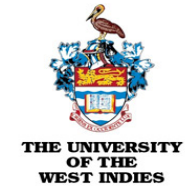


GLOBAL 2025 TARGET

RAISED BLOOD
PRESSURE

25%
REDUCTION





Global Standardized Hypertension Treatment Project





Global Standardized
Hypertension
Treatment Project

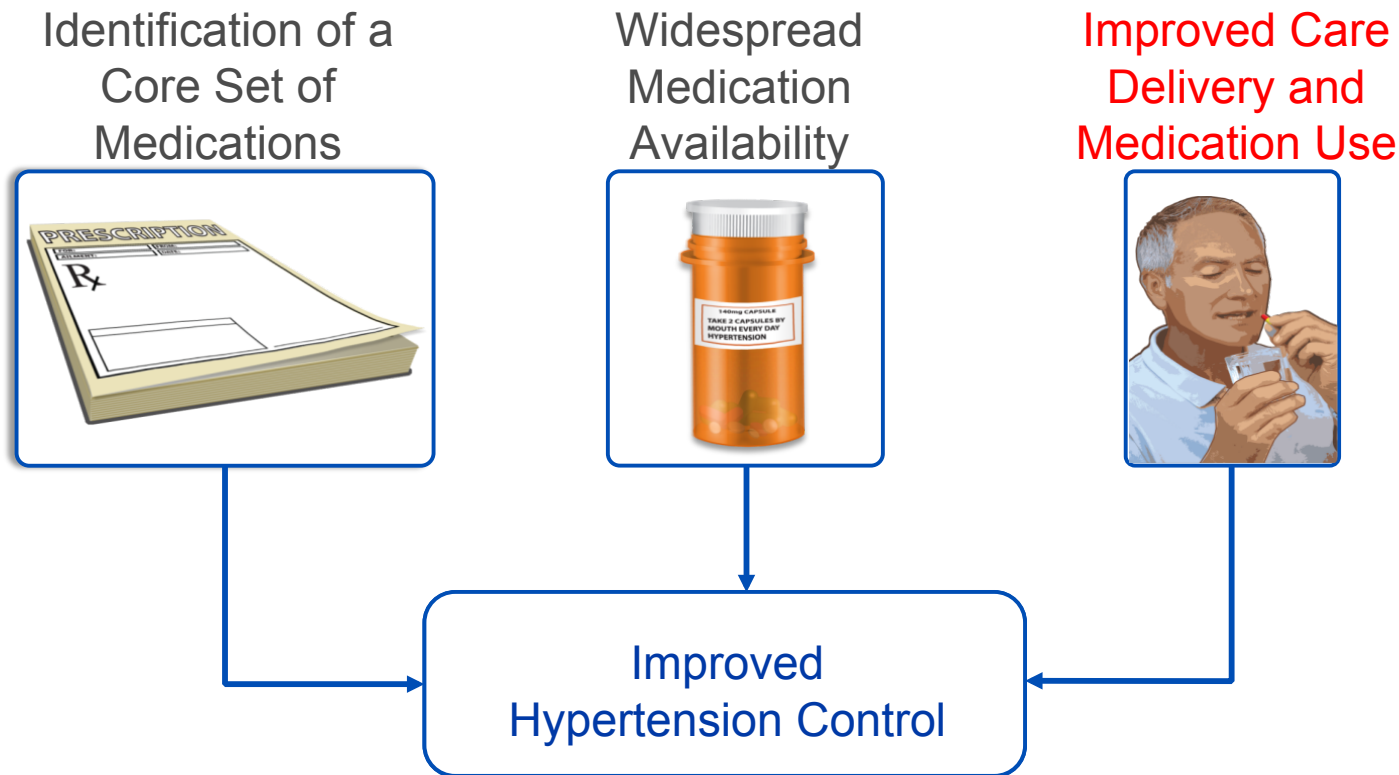
Pilot Objective

- **Improved control** of patients with HTN in Barbados applying approaches determined at GSHTP Workshop, Miami, 2013.



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The GSHTP Approach – Standardize & Simplify



Challenges to Optimal Care

■ Patient Challenges

- Limited access and poor adherence to treatment

Challenges to Optimal Care

■ Health Care Provider Challenges

- Raised blood pressure attributed to “white coat” hypertension
- Reluctance to treat an asymptomatic condition
- Lack of adequate time with patient
- Therapeutic inertia
- Lack of adherence to current treatment guidelines

Challenges to Optimal Care

▣ Health Systems Challenges

- Failure to delegate responsibility to non-physicians
- Inappropriate follow-up
- Absence of feedback to clinicians
- Issues related to supply, distribution, and cost of medications
- Complex medication regimens
- Accountability - How well is BP controlled the doctor?

How could we improve care?

- ❑ Strategy
- ❑ Guidelines
- ❑ Registries/Information Systems
- ❑ Medications
- ❑ Patient-Centeredness (including self-management interventions)
- ❑ Care System (organizational management to implement a primary health care-led system)
- ❑ Community

Barbados Pilot

- Baseline data was gathered from the Winston Scott Polyclinic and the Edgar Cochrane Polyclinics
- Baseline data:
 - Direct observation of practice
 - Medical Records
 - HCP Questionnaires
 - Interviews with stakeholders
 - Hypertension Masterclasses hosted by the GSHTP



What has been done to date?

- Formal discussions and Approval from MoH
- Initial engagement of “buy in” from stakeholders
- Initial Project defining meeting
- Development and use of Baseline data collection tool
- Completion of Baseline data & Preliminary analysis
- Completion of *Health Care Provider* training tools



Achievements to Date . .

1. Launching of a standardized EBM Hypertension Treatment Protocol
2. Complete system analysis of existing practices in hypertension management
3. Healthcare provider training through Hypertension Masterclasses
4. Creating a hypertensive registry

Achievements to Date . . .

5. Creation of a customized hypertension prescription
6. Seamless incorporation into the BDF with national expansion
7. Training of doctors nurses and pharmacists
8. Implementation of a hypertension screening programme at the clinic sites

Customized Rx



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Customized Prescriptions of Antihypertensive
Medications

001020

Patient's Name:National ID No: Age:

Patient's Address:
.....

ACE Inhibitors	Duration	Sign	Calcium Channel Blockers	Duration	Sign
<i>Lisinopril</i> 5 mg po od	<input type="checkbox"/> _____		<i>Amlodipine</i> 5 mg po od	<input type="checkbox"/> _____	
<i>Lisinopril</i> 10 mg po od	<input type="checkbox"/> _____		<i>Amlodipine</i> 10 mg po od	<input type="checkbox"/> _____	
<i>Ramipril</i> 5 mg po od	<input type="checkbox"/> _____				
<i>Ramipril</i> 10 mg po od	<input type="checkbox"/> _____				

Angiotensin Receptor Blockers	Duration	Sign	Diuretics	Duration	Sign
<i>Valsartan</i> 160 mg po od	<input type="checkbox"/> _____		<i>Chlorthalidone</i> 12.5 mg po od	<input type="checkbox"/> _____	
<i>Valsartan</i> 320 mg po od	<input type="checkbox"/> _____		<i>Chlorthalidone</i> 25 mg po od	<input type="checkbox"/> _____	
<i>Losartan</i> 50 mg po od	<input type="checkbox"/> _____		<i>HCT</i> 12.5 mg po od	<input type="checkbox"/> _____	
<i>Losartan</i> 100 mg po od	<input type="checkbox"/> _____		<i>HCT</i> 25.0 mg po od	<input type="checkbox"/> _____	

Beta Blockers	Duration	Sign	Other	Duration	Sign
Bisoprolol 2.5 mg po od	<input type="checkbox"/> _____				
Bisoprolol 5.0 mg po od	<input type="checkbox"/> _____				
Bisoprolol 7.5 mg po od	<input type="checkbox"/> _____				
Bisoprolol 10 mg po od	<input type="checkbox"/> _____				

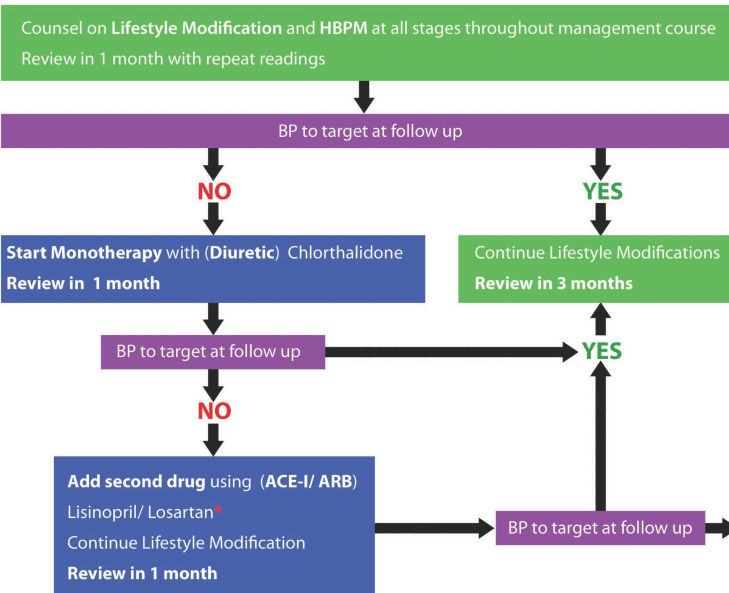
For Physician Only	For Pharmacist Only
Physician Name:	Pharmacist Name:
Physician Registration Number	Physician Registration Number
Signature	Signature
Date	Date
Stamp	Stamp

Standardized Protocol



Hypertension Treatment Protocol

Newly Diagnosed/Uncontrolled Hypertensive Patients



Special Treatment Considerations

Diabetes Mellitus

ACE-I (Lisinopril)/**ARB** (Losartan) +/- **Diuretic** (Chlorthalidone) +/- **CCB** (Amlodipine) + Standard Hypoglycemic agents

Coronary Artery Disease / Post MI

BB (Bisoprolol/Carvedilol) + **ACE-I** (Lisinopril)/**ARB** (Losartan) + Standard Anti-Ischaemic medications

Heart Failure with Reduced EF

ACE-I (Lisinopril)/**ARB** (Losartan) + **BB** (Bisoprolol/Carvedilol) + Spironolactone + Loop Diuretic

Previous Stroke or TIA

Diuretic (Chlorthalidone) + **ACE-I** (Lisinopril)/**ARB** (Losartan)

Hypertensive emergency - REFER TO A+E

Address Adherence issues

Optimize medication doses

Add 3rd drug - (CCB) Amlodipine

Review in 1 month

If uncontrolled at review, despite adherence on 3 drugs (at target doses including a diuretic) consider secondary causes of Hypertension or Resistant Hypertension and Refer to **Hypertension Specialist**

Special Considerations

For newly diagnosed patients whose BP is either ≥ 160 mmHg systolic or ≥ 100 mmHg diastolic, **INITIATE DUAL THERAPY** with 1st and 2nd line agents as above **AND review in 1 month**

* ARB's are to be used **ONLY** if patient has experienced significant side effects whilst on an ACE-I

NB Target BP is $<140/90$ mmHg except for diabetic patients for whom the target BP is $<140/80$ mmHg

Regional Conversations

- Key mandate - better BP control in Caribbean & Latin America
- Engagement with key regional stakeholders
- CARPHA

Take Home Points

Better Hypertension Health Care delivery model could lead to:

- ✓ Better BP control with more affordable drugs
- ✓ A better health care team approach model
- ✓ Overall reduction in COST for the management of HTN
- ✓ A template model for other NCDs - Diabetes





Global Standardized Hypertension Treatment Project

*OECS Ministers of Health meeting
St. Vincent October 2014*

*Dr. Kenneth Connell
GSHTP Principal Investigator*

The GSHTP Team

