

Initial Assessment of Risk Factors - Beginning at Age 20 to Include	
<ul style="list-style-type: none"> Family History Smoking Status and Readiness to Change Blood Pressure (goal <120/80) Fasting Lipid Panel Dietary and Physical Activity Assessment 	<ul style="list-style-type: none"> BMI Calculation Past Medical History Assessment (including history of atrial fibrillation and diabetes) Waist Circumference
Clinical Identification of Metabolic Syndrome – Any 3 of the Following:	
<ul style="list-style-type: none"> Waist Circumference >40" (men), >35" (women) Blood Pressure >130 / >85 mm/Hg Fasting Glucose ≥110 mg/dL 	<ul style="list-style-type: none"> Triglycerides ≥150 mg/dL HDL Cholesterol <40 mg/dL (men), <50 mg/dL (women)
Assess and treat underlying causes.	
Blood Pressure	
<ul style="list-style-type: none"> 120-139/80-89: Counsel on lifestyle changes, recheck 3 months. ≥140/90 (≥130/80 for those with diabetes or chronic kidney disease): Promote lifestyle changes, begin drug therapy (See Figure 1), and agree upon blood pressure goals with patient. Monthly follow-up until blood pressure is stable, then follow-up every 3-6 months. 	

Figure 1

Algorithm for Treatment of Hypertension

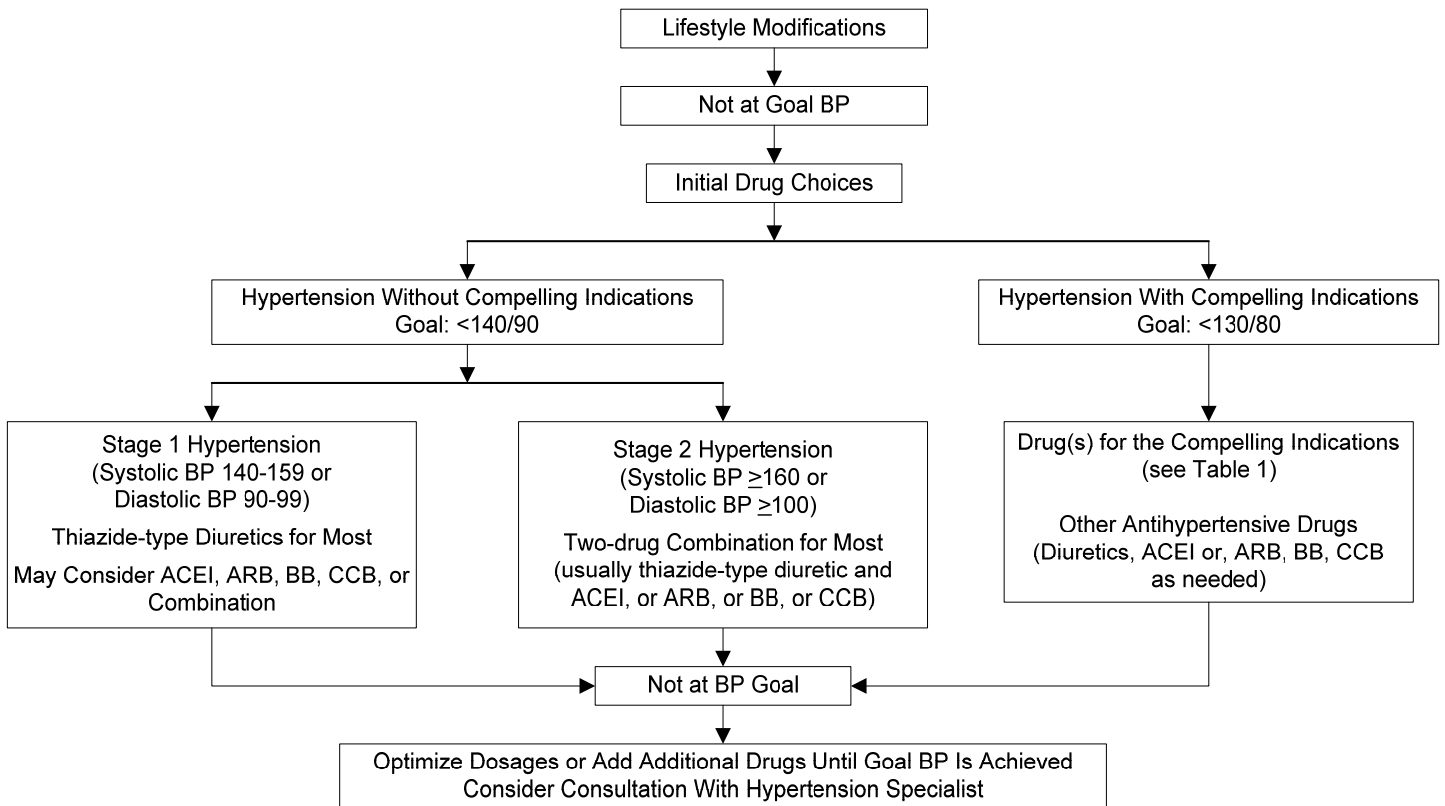


Table 1

Compelling Indications for Individual Drug Classes	
Compelling Indications	Initial Therapy Options
Heart Failure	THIAZ, BB, ACEI, ARB, ALDO ANT
Post Myocardial Infarction	BB, ACEI, ALDO ANT, ARB
High CVD Risk	THIAZ, BB, ACEI, CCB, ARB
Diabetes	THIAZ, BB, ACEI, ARB, CCB
Chronic Kidney Disease	ACEI, ARB
Recurrent Stroke Prevention	THIAZ, ACEI, ARB

Key: THIAZ = thiazide diuretic, ACEI = angiotensin converting enzyme inhibitor, ARB = angiotensin receptor blocker, BB = beta blocker, CCB = calcium channel blocker, ALDO ANT = aldosterone antagonist

Lipid Management			
Primary Prevention	Use the risk calculator at www.nhlbi.nih.gov/guidelines/cholesterol to determine LDL goal and if therapeutic lifestyle changes or drug therapy are indicated.		
Secondary Prevention	LDL <100 mg/dL	LDL 100 – 129 mg/dL	LDL ≥130 mg/dL
	Goal: LDL <100 mg/dL Optional Goal: <70 mg/dL (in patients with very high CV risk)		
	<ul style="list-style-type: none"> Consider LDL-lowering therapy if patient is still at very high-risk for future CVD events Consider fibrate, omega-3 fatty acids, or niacin if low HDL or high TG 	<ul style="list-style-type: none"> Intensify LDL-lowering therapy Fibrate or niacin (if low HDL or high TG) Consider combined drug therapy if low HDL or high TG 	<ul style="list-style-type: none"> Intensify LDL-lowering therapy Add or increase drug therapy with lifestyle therapies Consider referral to a specialist
	Consider pill splitting or generic equivalents as available to increase patient compliance.		
Dietary and Physical Activity Assessment			
<ul style="list-style-type: none"> Physical activity, of moderate intensity, for at least 30 minutes on most days of the week. Decrease cholesterol, saturated fat, trans fatty acids and increase fiber. 			
BMI			
<ul style="list-style-type: none"> Achieve and maintain BMI at 18.5 – 24.9 Kg/m² 			
Diabetes			
<ul style="list-style-type: none"> Initiate appropriate therapy to achieve an A1c <7% 			
Chronic Atrial Fibrillation			
<ul style="list-style-type: none"> Anticoagulation with INR 2.0 – 3.0 			
ASA Therapy			
<ul style="list-style-type: none"> 2 or more risk factors, especially those with CHD 10yr risk of ≥10%, and no contraindications—prescribe 81-162 mg/QD 			
Depression Screening			
<ul style="list-style-type: none"> Screen for Depression 			
Disease Management Support			
<ul style="list-style-type: none"> One to one interaction for personal education and support Resource tools to assist with self management of chronic conditions To refer a patient, call: <ul style="list-style-type: none"> HealthNow Inc: (877) 878-8785 Independent Health: (716) 635-3764 Univera: (800) 690-9012 			

REFERENCES:

- The Seventh Report of the Joint National Committee on Prevention, Detection, Evaluation and Treatment of High Blood Pressure (JNC VII) May 2003
- The Third Report of the National Cholesterol Education Program (NCEP) Expert Panel on Detection, Evaluation and Treatment of High Blood Cholesterol in Adults (ATP III) May 2001
- Implications of Recent Clinical trials for the NCEP ATP III Guidelines, Circulation. 2004; 110:227-239.
- AHA Guidelines for Primary Prevention of Cardiovascular Disease and Stroke: 2002 Update
- Annals of Internal Medicine.Narrative Review: Lack of Evidence for Recommended Low-Density Lipoprotein Treatment Targets: A Solvable Problem. 2006.145:520-530
- AHA/ACC Secondary Prevention for Patients with Coronary and Other Vascular Disease: 2006 Update.