JNC-8 Blood Pressure and ACC/AHA Cholesterol Guideline Updates

January 30, 2014
GOALS

• Review key recommendations from recently published guidelines on blood pressure and cholesterol management

• Discuss implications for PPRNet clinical quality measures
• Recommendations in response to “high priority” questions
• Based on systematic review restricted to randomized controlled clinical trial evidence
• Evidence grades range A (strong) to E (expert opinion)
WHAT’S NEW?

- Starting rx (+ lifestyle)

<table>
<thead>
<tr>
<th>Patient characteristics</th>
<th>BP</th>
<th>Evidence Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>&lt; 60 years</td>
<td>140/90 mmHg</td>
<td>E</td>
</tr>
<tr>
<td>Diabetes</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CKD</td>
<td></td>
<td></td>
</tr>
<tr>
<td>≥ 60 years</td>
<td>150/90 mmHg</td>
<td>A</td>
</tr>
</tbody>
</table>

©PPRNet 2014
**WHAT’S NEW?**

- **Goal BP**

<table>
<thead>
<tr>
<th>Patient characteristics</th>
<th>Goal</th>
<th>Evidence Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>&lt; 60 years</td>
<td>&lt; 140/90 mmHg</td>
<td>E</td>
</tr>
<tr>
<td>Diabetes</td>
<td></td>
<td>A for DBP in 30-59 year olds</td>
</tr>
<tr>
<td>CKD</td>
<td></td>
<td></td>
</tr>
<tr>
<td>≥ 60 years</td>
<td>&lt; 150/90 mmHg</td>
<td>A</td>
</tr>
</tbody>
</table>
### WHAT’S NEW?

- Medication selection

<table>
<thead>
<tr>
<th>Patient characteristics</th>
<th>Initial rx</th>
<th>Evidence Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nonblack</td>
<td>Thiazide CCB ACEI ARB</td>
<td>B</td>
</tr>
<tr>
<td>Black</td>
<td>Thiazide CCB</td>
<td>B – pts with diabetes</td>
</tr>
<tr>
<td>CKD</td>
<td>ACEI ARB</td>
<td>B</td>
</tr>
</tbody>
</table>
• Treatment of mild hypertension in low-risk adults
  – Recommendations contradict Cochrane review that found no evidence of benefit

• Treatment goal for patients 60-79 years
  – “Minority” JNC8 panel published concerns re 150 mmHg vs 140 mmHg SBP goal
  – Use patient-centered targets for patients at high risk for CV events
greater emphasis on limited data and adverse events from targeting aggressive goals

“...not a substitute for clinical judgment, and decisions about care must carefully consider and incorporate the clinical characteristics and circumstances of each individual patient”
• Clinical quality measures used in national incentive programs have not (yet) been adjusted

• American Heart Association/American College of Cardiology guidelines to be published in 2015
<table>
<thead>
<tr>
<th>2. DM patients with most recent blood pressure &lt; 140/90</th>
</tr>
</thead>
<tbody>
<tr>
<td>14. HTN patients with most recent BP &lt; 140/90 in past 6 months</td>
</tr>
</tbody>
</table>

- Age range 18-75 years
  - Based on CMS MU Clinical Quality Measures
• Adjust age-based criteria to match guideline
  – Pts 18-60 years: < 140/90 mmHg
  – Pts > 60 years < 150/90 mmHg
“You can enjoy diabetes, high cholesterol and hypertension or you can suffer from good health.”
2013 ACC/AHA Guideline on the Treatment of Blood Cholesterol to Reduce Atherosclerotic Cardiovascular Risk in Adults

A Report of the American College of Cardiology/American Heart Association Task Force on Practice Guidelines

Endorsed by the American Association of Cardiovascular and Pulmonary Rehabilitation, American Pharmacists Association, American Society for Preventive Cardiology, Association of Black Cardiologists, Preventive Cardiovascular Nurses Association, and WomenHeart: The National Coalition for Women with Heart Disease


• Based on systematic review restricted to randomized controlled clinical trial evidence
• Class of recommendation (I-III) and level of evidence grades (A-E, N)
WHAT’S NEW?

• Use specific statin doses to achieve improved outcomes in four “statin benefit” patient groups
  – High dose
    • Atorvastatin 40-80 mg
    • Rosuvastatin 20-40 mg
  – Moderate dose
    • Atorvastatin 10-20 mg
    • Fluvastatin 80 mg
    • Lovastatin 40 mg
    • Pitavastatin 2-4 mg
    • Pravastatin 40-80 mg
    • Rosuvastatin 5-10 mg
    • Simvastatin 20-40 mg

• Addition of “non statins” doesn’t reduce CV risk
  – Reserve for patients with tolerability issues or hypertriglyceridemia
## WHAT’S NEW?

<table>
<thead>
<tr>
<th>“Statin Benefit” Patient Groups</th>
<th>Statin Dose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age 21-75 yrs with clinical atherosclerotic CV disease (ASCVD)</td>
<td>High</td>
</tr>
<tr>
<td>Age ≥ 21 yrs LDL ≥ 190 mg/dl</td>
<td>High</td>
</tr>
<tr>
<td>Age 40-75 yrs with diabetes and LDL 70-189 mg/dL</td>
<td>Moderate</td>
</tr>
<tr>
<td>Age 40-75 yrs without diabetes or ASCVD and estimated 10-year risk of ≥ 7.5%</td>
<td>Moderate-high</td>
</tr>
</tbody>
</table>
WHAT’S NEW?

• Pooled Cohort Equations CV Risk Calculator for 10-year and Lifetime Risks
  – Age
  – Gender
  – Race
  – Total cholesterol
  – HDL cholesterol
  – Systolic BP
  – HTN treatment
  – Diabetes
  – Smoking

• Use q 4-6 years in patients 20-79 years of age

http://my.americanheart.org/cvriskcalculator.
WHAT’S NEW?

• Monitoring recommendations
  – Baseline lipid panel and follow-up to assess adherence
    • 4-12 weeks after statin initiation
    • Q3-12 mos for ongoing monitoring
  – Baseline LFTs
    • Repeat only if clinically warranted
Lifestyle modifications appropriate for all
  – Tobacco cessation
  – Heart-healthy diet
  – Maintain healthy weight
  – Exercise 40 min 3-4 x per week
**CONTROVERSIAL POINTS**

- Criticism of risk calculator
  - Not evaluated prospectively in primary prevention trials
  - Potential overestimation of risk?

- Initiation of high dose statins prioritized above titration for improved tolerability
SUMMARY: 2013 ACC/AHA CHOLESTEROL GUIDELINE

- Primary prevention with statin “may be less clear in other groups… consider additional factors influencing ASCVD risk, benefits and adverse effects, drug-drug interactions, and patient preferences”

- Clinical quality measures used in national incentive programs have not (yet) been adjusted
## Cardiovascular Disease

19. CHD or atherosclerosis patients with most recent LDL-C < 100 mg/dl
20. CHD or atherosclerosis patients with current lipid lowering Rx

## Diabetes Mellitus

8. DM patients with most recent LDL-C < 100 mg/dl
IMPLICATIONS FOR PPRNET MEASURES

• Adjust “statin benefit groups” and goal to match guideline
  – High dose statin in pts with ASCVD age 21-75 yrs
  – Moderate dose statin in pts with diabetes age 40-75 yrs

• Remove measure on lipid lowering rx (statins + non-statins) in pts with CHD or atherosclerosis
CHECK YOUR PULSE. IF YOU HAVE ONE, YOU SHOULD BE TAKING STATIN DRUGS.
TAKE HOME POINTS

• Recently published guidelines on both BP and cholesterol refocus on the evidence and patient-centered treatment targets
  – Less aggressive BP targets for older patients
  – More attention to statin dose in cholesterol management

• PPRNet quality measures are continually updated based on available evidence and aligned with nationally-endorsed measures, as appropriate
• More information to come on a PPRNet project related to primary care patient and provider stakeholder perspectives on implementing these new guidelines

• We will be looking for practices to advise and partner with the research team
REMINDER

• Save the date!

PPRNet 19th Annual Network Meeting
August 21-23, 2014
Charleston, South Carolina
Discussion