

PICO question 10: In adults with hypertension given pharmacological treatment, when should BP be reassessed?

	CRITERIA	JUDGEMENTS	RESEARCH EVIDENCE/PANEL INPUT															
VALUES	<p><b>Is there important uncertainty or variability about how much people value the main outcomes?</b></p>	<table style="width: 100%; border-collapse: collapse;"> <tr> <td style="text-align: center; width: 20%;">Important uncertainty or variability</td> <td style="text-align: center; width: 20%;">Possibly important uncertainty or variability</td> <td style="text-align: center; width: 20%;">Probably no important uncertainty or variability</td> <td style="text-align: center; width: 20%;">No important uncertainty or variability</td> <td style="text-align: center; width: 20%;">No known undesirable outcomes</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input checked="" type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input type="checkbox"/></td> </tr> <tr> <td colspan="5" style="text-align: center;"><b>Detailed judgements</b></td> </tr> </table>	Important uncertainty or variability	Possibly important uncertainty or variability	Probably no important uncertainty or variability	No important uncertainty or variability	No known undesirable outcomes	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<b>Detailed judgements</b>					<p><b>RESEARCH EVIDENCE</b></p> <p>Overall, society and patients want to reduce risk of premature mortality or morbidity. Many patients, particularly older ones or those living alone, are reassured by more frequent monitoring of BP. Patients became less fearful of being alone, or not picking up an important clinical sign that their condition may be deteriorating.<sup>76</sup> However, younger, less symptomatic, patients do not request repeat readings at follow-up visits since HTN is a “silent disease” that they do not feel.</p> <p>Despite existing evidence on the effectiveness of telemonitoring for patients experiencing HTN, there is no empirical evidence of its potential success over longer periods of time as well as its generalizability to patients with various backgrounds and educational levels who might react differently to this approach, though several studies identified potential savings and a reduction in the number of visits to health care providers.<sup>77</sup></p> <p>Busy primary care physicians often fail to ask about adherence and frequently do not adjust medications for uncontrolled patients.<sup>78</sup></p> <p><b>PANEL INPUT</b></p> <p>Providers in LICs and MICs are overwhelmed, seeing up to 100 cases per day, and anything that can reduce visits without affecting control would be welcomed.</p> <p>Self-monitoring and remote monitoring are likely to be preferred by patients.</p>
Important uncertainty or variability	Possibly important uncertainty or variability	Probably no important uncertainty or variability	No important uncertainty or variability	No known undesirable outcomes														
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>														
<b>Detailed judgements</b>																		

BENEFITS AND HARMS OF THE OPTIONS	<p><b>What is the overall certainty of the evidence of effects?</b></p> <p>No included studies    Very low    Low    Moderate    High</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/></p> <p>Detailed judgements</p>	<p>ACCORD and SPRING followed patients initially for one month.</p> <p>Longer follow-up times can lead to loss to follow up.</p> <p>There appears to be limited data to address this specific question. One RCT compared three months of follow-up to six months after patients were controlled and found no significant difference.<sup>79</sup></p> <p>One well-conducted retrospective cohort study<sup>80</sup> reported two important findings: for those who were newly diagnosed or on new medications:</p> <ol style="list-style-type: none"> <li>For those newly diagnosed with HTN those with &gt;1.4 months prior to initiation of treatment had HR of 1.12 (1.05–1.2, p &lt; 0.009) for MACE compared to those started &lt;1.4 months.</li> <li>For those with initiated treatment, those who waited &gt;2.7 months before re-evaluation had HR 1.18 (1.11–1.25, p &lt; 0.0001) for MACE compared to those reassessed &lt;2.7 months.</li> </ol>
	<p><b>How substantial are the desirable anticipated effects?</b></p> <p>Don't know    Trivial    Small    Moderate    Large    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/></p> <p>Detailed judgements</p>	
	<p><b>How substantial are the undesirable anticipated effects?</b></p> <p>Don't know    Trivial    Small    Moderate    Large    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/></p> <p>Detailed judgements</p>	
	<p><b>Do the desirable effects outweigh the undesirable effects?</b></p> <p>No    Probably No    Don't know    Probably Yes    Yes    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/></p> <p>Detailed judgements</p>	
RESOURCE USE	<p><b>How large are the resource requirements?</b></p> <p>Large costs    Moderate costs    Small    Moderate savings    Large savings    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/></p> <p>Detailed judgements</p>	<p>No comparative data were identified. Input from panel suggests that many patients in LICs and MICs require monthly clinic visits to pick up medicines, while in HICs the frequency is less. For newly diagnosed and newly initiated on therapy this may be no change in resources in LICs and MIC. However, this would be offset by less frequent visits over the long term if stable patients did not require visits more frequently than twice per year.</p>
	<p><b>How large is the incremental cost relative to the net benefit?</b></p> <p>Very large ICER    Large ICER    Moderate ICER    Small ICER    Savings    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/></p> <p>Detailed judgements</p>	

EQUITY	What would be the impact on health inequities?	<p>Increased    Probably increased    Uncertain    Probably reduced    Reduced    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/></p> <p>Detailed judgements</p>	Meigari et al. suggest that it will be difficult in low income countries to increase frequency of visits but may be feasible if community HCWs or other workers can be involved in management of BP. Use of home monitoring may be useful. <sup>21</sup> It may reduce inequities when you have a structured follow up framework. However, when system barriers exist, it may worsen.
ACCEPTABILITY	Is the option acceptable to key stakeholders?	<p>No    Probably No    Uncertain    Probably Yes    Yes    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/></p> <p>Detailed judgements</p>	Older and more vulnerable patients would appreciate more frequent monitoring but it will have implications on health systems. <sup>4,76</sup>
FEASIBILITY	Is the option feasible to implement?	<p>No    Probably No    Uncertain    Probably Yes    Yes    Varies</p> <p><input type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/>    <input checked="" type="checkbox"/>    <input type="checkbox"/>    <input type="checkbox"/></p> <p>Detailed judgements</p>	Will require use of Community HCWs or other health professionals and some evidence of benefit of telemonitoring to increase frequencies to less than a month. This has been demonstrated to be acceptable to patients.

## Recommendation 7: frequency of assessment

<b>Recommendation</b>	<p><b>WHO suggests a monthly follow up after initiation or a change in antihypertensive medications until patients reach target.</b></p> <p><b>WHO suggests a follow up every 3–6 months for patients whose blood pressure is under control.</b></p>				
<b>Type of recommendation</b>	We recommend against the option or for the alternative	We suggest not to use the option or to use the alternative	We suggest using either the option or the alternative	<b>We suggest using the option</b>	We recommend the option
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
<b>Justification</b>	<p>Data suggests that initiating treatment early after diagnosis improves outcomes and that delaying evaluation after initiation also may increase risk of MACE.</p> <p>Once a patient is established in care and BP is under control the frequency of visits is less important. One study showed that there was no statistical difference in measured BP if seen every three months vs six months.<sup>79</sup></p>				
<b>Subgroup considerations</b>	Older patients with more comorbidities may require more frequent visits relative to younger patients on fewer overall medications.				
<b>Implementation considerations</b>	<ul style="list-style-type: none"> <li>• Initiation of HTN treatment should occur within four weeks of diagnosis of HTN. If BP level is high or accompanying evidence of end organ damage, initiation of treatment should be faster</li> <li>• Will require system that can track appointments over time and the staffing necessary to meet needs of number of visits and/or use of remote monitoring and task-sharing to achieve increased visits</li> </ul>				
<b>Monitoring and evaluation considerations</b>	BP monitoring and data capture mechanisms. System linking pharmacy records to visits for evaluation.				
<b>Research priorities</b>	<p>Evidence that remote monitoring and use of community HCWs/navigators can assist in management of BP.</p> <p>Effectiveness of community/home-based monitoring of BP.</p>				