

Appropriateness Phase 1 OHTAC Recommendations: Annual Health Exams, Aspartate Aminotransferase Testing, Chloride Testing, Creatine Kinase Testing, Ferritin Testing, Folate Testing, and Vitamin B12 Testing

Ontario Health Technology Advisory Committee

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Background

Overuse, underuse, and misuse of interventions are important concerns in health care and lead to individuals receiving unnecessary or inappropriate care. In April 2012, under the guidance of the Ontario Health Technology Advisory Committee's Appropriateness Working Group, Health Quality Ontario (HQO) launched its Appropriateness Initiative. The objective of this initiative is to develop a systematic framework for the ongoing identification, prioritization, and assessment of health interventions in Ontario for which there is possible misuse, overuse, or underuse.

For more information on HQO's Appropriateness Initiative, visit our website at www.hqontario.ca.

Seven health interventions were examined in the first phase of the Appropriateness Initiative:

- Annual health exams (or periodic health exams)
- Asparate aminotransferase (AST) testing in community-based laboratories
- chloride testing in community-based laboratories
- creatine kinase testing in community-based laboratories
- ferritin testing in community-based laboratories
- folate testing in community-based laboratories
- vitamin B12 testing in community-based laboratories

Each topic was assessed to determine what type of analysis would be conducted, balancing the complexity of the topic, and the amount and quality of available evidence. Three types of analyses were used: rapid reviews, full evidence-based analyses, or expert consultations. Rapid reviews consist of a literature search limiting study design types to systematic reviews, health technology assessments, meta-analyses, and clinical practice guidelines. Expert consultations alone were used for several tests/interventions for which there is very limited evidence but consensus by experts on the appropriate use. Contextualization of evidence through expert panels was undertaken in all three types of analyses.

Appropriateness Phase 1: OHTAC Recommendations

Topic	OHTAC Recommendations	Source of Evidence
Annual health exams	OHTAC recommends decreasing the frequency of annual health exams to every 2 years in asymptomatic adults.	Rapid review
Aspartate aminotransferase (AST) testing in community-based laboratories	OHTAC recommends that AST testing be restricted to ordering by or on the advice of physicians with experience treating liver disorders.	Expert opinion
Chloride testing in community-based laboratories	OHTAC recommends that chloride be removed from the Ontario laboratory requisition form.	Expert opinion
Creatine kinase testing in community-based laboratories	<p>OHTAC recommends that creatine kinase be removed from the Ontario laboratory requisition form.</p> <p>Given the uncertainty regarding rhabdomyolysis (muscle breakdown) caused by statins, it is recommended that this be explored further through a field evaluation using existing administrative datasets by the Institute for Clinical Evaluative Sciences (ICES).</p> <p><i>Note: further recommendations on the appropriate testing parameters for creatine kinase may be added after the field evaluation has been completed.</i></p>	Rapid review

<p>Ferritin testing in community-based laboratories</p>	<p>OHTAC recommends removing ferritin from the Ontario laboratory requisition form.</p> <p>OHTAC recommends adding ferritin to the antenatal form 1 to ensure appropriate screening of asymptomatic pregnant women in accordance to guidelines.</p> <p>OHTAC recommends restricting ferritin testing to individuals with the following conditions:</p> <ul style="list-style-type: none"> - suspected iron overload - unexplained iron deficient anemia - asymptomatic pregnant females - suspected chronic blood loss 	<p>Rapid review</p>
<p>Folate testing in community-based laboratories</p>	<p>OHTAC recommends that red blood cell folate testing be restricted to individuals with:</p> <ul style="list-style-type: none"> - low hemoglobin levels and a high mean corpuscular volume - individuals with suspected gastrointestinal disorders causing malabsorption or suspected malnutrition of any cause. 	<p>Expert opinion</p>
<p>Vitamin B12 testing in community-based laboratories</p>	<p>OHTAC recommends that vitamin B12 be removed from the Ontario laboratory requisition form.</p>	<p>Rapid review</p>