

Date: May 6, 2019
To: Physicians in South Zone, Three Hills, Hanna, & Drumheller
From: Alberta Public Laboratories Chemistry and Microbiology
Re: *H. pylori* Testing

PLEASE POST OR DISTRIBUTE AS WIDELY AS APPROPRIATE

Key Message:

- Effective May 21, 2019, APL sites in South Zone, Three Hills, Hanna, and Drumheller will provide the *H. pylori* Stool Antigen Test (HpSAT) as the screening test for *H. pylori* infection.
- HpSAT has equivalent performance to the Urea Breath Test (UBT), is easier for patients to collect and quicker to access, thus improving turnaround times.
- The UBT will remain available in limited situations.

Importance/Impact:

HpSAT

- Use a local community laboratory requisition.
- Results will be available within 48 h from time of receipt at the Calgary Diagnostic & Scientific Center (DSC).
- Collection of a stool sample is required. No age restrictions apply.
- No appointment required. Patients may drop off random stool samples with a fully completed requisition at any laboratory location.
- Medication restrictions and sample handling requirements apply. See the Laboratory Test Directory (<http://www.calgarylabservices.com/lab-services-guide/microbiology/Test/Tests/Helicobacter-pylori-Antigen.htm>) and patient collection instructions (Form #MI6176 - <http://www.calgarylabservices.com/files/CLSForms/MI6176.pdf>).

UBT

- Can be ordered by a gastroenterologist (following the Dyspepsia Enhanced Primary Care Pathway Algorithm, <http://www.calgarygi.com/index.php?mode=webpage&id=794&pp=792>), or by the microbiologist on call (for patients with persistent symptoms following two negative HpSAT results).
- Use a UBT requisition (<http://www.calgarylabservices.com/files/HealthcareProfessionals/Requisitions/REQ9080UBT.pdf>).
- UBT orders on community requisitions will be substituted with HpSAT unless approval for UBT has been obtained.
- Appointments are necessary in some locations. Refer to the Laboratory Test Directory.
- Currently booked UBT appointments will be honored.

Action Required:

- Refer to the Laboratory Test Directory for HpSAT patient preparation, collection, and sample handling instructions.
- For UBT, consult a gastroenterologist or contact the microbiologist on call. A completed UBT requisition is required.

Background:

- Key international guidelines (1-3) support the equivalence of HpSAT with UBT for diagnosis of *H. pylori* infection.
- A CLS study (4) demonstrated that HpSAT performed with 98.7% equivalence, 99.2% negative predictive value, and 100% positive predictive value compared to UBT.

Inquiries and feedback may be directed to:

South Sector Rural Microbiologist on Call, 403-770-3799

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References:

1. Malfertheiner P et al. Management of *Helicobacter pylori* infection-the Maastricht V/Florence Consensus Report. *Gut* 2017; 66:6-30.
2. El-Serag HB et al. Houston Consensus Conference on testing for *Helicobacter pylori* infection in the United States. *Clin Gastroenterol Hepatol* 2018; 16(7). doi:10.1016/j.cgh.2018.03.013.
3. Canadian Agency for Drugs and Technologies in Health. Stool antigen tests for *Helicobacter pylori* infection: a review of clinical and cost-effectiveness and guidelines. CADTH Rapid Response Report 2015; January 8, 2015.
4. Fong E, Nguyen H, Kitt S, Guo M, Sabuda S, Naugler C, Church D, and Pillai DR. *Open Forum Infect Dis* 2018; 5(S1):S580.