



**PLEASE COPY FOR ALL
PHYSICIANS
IN YOUR OFFICE**

From the Office of the
Medical Health Officer
March 17, 2021

Transmission of Tuberculosis (TB) and Shigella in Under-Housed Groups in Fraser Health

TB:

Public Health has noted a recent uptick in cases of TB that are part of a genomically-linked cluster among people who are under-housed.

Case demographics show:

- almost 80% are male;
- two-thirds ≥40 years age;
- almost 60% from Surrey; and,
- three-quarters are Canadian-born.

Among this cluster, the 4 most common risk factors identified are:

- homelessness, in >60%; tobacco use; other substance use; and, group living.

Fortunately, drug resistant TB has not been associated with this cluster but of concern, **two-thirds of newly identified cases are smear-positive, suggesting delay in diagnosis.** Over half of the cases reported TB-compatible symptoms.

Due to the transient nature of groups who may be impacted, the key to stopping transmission is having a **high clinical index of suspicion for TB** so that cases are diagnosed and identified promptly.

Please consider TB - particularly in patients with risk factors that have been associated with this cluster, or TB disease more generally (e.g., immunosuppression) especially if patients present with:

- fever
- persistent cough, hemoptysis
- fatigue, anorexia, weight loss, night sweats

If suspicious, please recommend and support the patient to get a **CXR and arrange for collection of 3 sputum samples for testing.** Note that **tuberculin skin testing is not appropriate if active TB disease is suspected.**

Shigella flexneri:

An outbreak of *Shigella flexneri* has been identified in residents of Vancouver's Downtown Eastside, with multiple patients requiring hospitalization. Fraser Health is also seeing an increase in Shigellosis in the **homeless/transient population**, as many these clients may frequent the **Downtown Eastside.**

Cases may present with **diarrhea, fever, nausea, cramps and tenesmus.** *Shigella* can cause **diarrhea that is bloody, mucoid, or watery.** Transmission is via the oral fecal route and can spread via food, any object touched by dirty hands, or sexual contact. The infectious dose is only 10-100 organisms so vigilant hand hygiene is necessary to prevent transmission.

Please consider Shigellosis in the differential diagnosis of Fraser Health patients presenting with gastroenteritis if they are homeless, under-housed, or part of the social network of the Downtown Eastside:

- Send stool culture for bacterial enteropathogens (Stool C+S).
- **Consider treating patients empirically** to reduce secondary transmission if your patient is unable to meaningfully isolate from others and maintain proper hygiene until their symptoms resolve.
- **If treating empirically, please use Azithromycin 500mg PO x 3 days.** For patients with a contraindication to Azithromycin, Cefixime 400mg PO daily for 5 days can be used. Recent cases have been resistant to Ampicillin, TMP/SMX, and Ciprofloxacin.

The Fraser Health Medical Health Officers are available for medical consultations at 604-587-3828 or 1-877-342-6467 (M-F, 0830-1630 hrs) or after hours at 604-527-4806.

Medical Health Officer
Fraser Health

400 – 13450 102nd Avenue
Surrey, BC V3T 0H1
Canada

Tel: (604) 930-5404
Fax: (604) 930-5414
www.fraserhealth.ca