

Blastomycosis

COMMUNICABLE DISEASE CONTROL

What is blastomycosis?

Blastomycosis is an uncommon infection of humans, dogs, cats and other animals caused by the fungus *Blastomyces dermatitidis* found in soil. It is not a new condition and has been known for many years. The infection affects the lungs and skin sometimes resulting in pneumonia or crusted, ulcerated pimples. The symptoms often do not appear until weeks or months after exposure.

How can you get blastomycosis?

You get blastomycosis by breathing in the fungus or getting it on a scrape or cut. The geographical regions where people have obtained infections include Ontario, Manitoba, Saskatchewan, Quebec and the areas surrounding the Great Lakes and Mississippi River. Moist acidic soil in particular, such as that found in the Manitoba-Ontario border regions, is conducive to the growth of this fungus. Since this fungus is in the soil, construction, digging, gardening or other interactions with soil may cause the fungal spores to be carried into the air and inhaled. Blastomycosis is not contagious from another infected person or animal.

Who is at risk?

Blastomycosis can affect anyone, but the risk of getting ill from this infection is low. Many people are resistant to it. The body's natural defenses fight the fungus and prevent illness. Exposure to the fungus may be higher for farmers, construction workers, hunters, campers and anyone else who is close to moist, acidic soil that is high in nitrogen content. However, the spores from this fungus may be found anywhere, so complete avoidance of exposure is not possible. This illness can be more severe in persons who have a weakened immune system.

What are the symptoms of blastomycosis?

Blastomycosis may seem like the "flu" with cough, muscle aches, joint pain, tiredness, chills and fever. These symptoms may develop suddenly, days to weeks after exposure to the fungus. In some people the symptoms can go away naturally but others may develop a persistent cough with yellow or green phlegm. This may be the first sign of pneumonia. A blastomycosis infection usually starts in the lungs but sometimes it can cause a skin infection. This will look like red pimples, which can develop crusts or ulcers, on the face or other exposed skin.

What should you do if you think you may have blastomycosis?

If you are experiencing a persistent cough, muscle aches, joint pain, tiredness, chills, low-grade fever, skin sores or unexplained weight loss, you should see your doctor. The doctor will want to know if you have been in geographical areas associated with the growth of the fungus and if you have been involved in activities that might result in exposure to the fungus. Often the first symptoms of the disease are missed because it seems like other illnesses. Without treatment blastomycosis can become a serious illness. The diagnosis can be made from a sample of phlegm, pus, urine or the skin lesions, depending on your symptoms. After diagnosis, prompt treatment is very important and may be required for several months or longer.

Can I avoid blastomycosis?

It is not possible to completely avoid exposure to blastomycosis spores. Even if you work, live or vacation in the geographical areas with moist, acidic soil, it is important to remember that blastomycosis is an uncommon illness and the risk of getting it is



low. Testing soil for the presence of this fungus is difficult and not reliable. If you do come in contact with the fungus, it does not mean you will become ill. If your immune system is weakened, you may wish to avoid direct contact with the soil, especially in areas where the likelihood for fungal growth is higher. Little is known about the actual fungal locations at any particular time or the conditions that cause the fungus to grow or die out in the soil.

It is reasonable to believe that wearing protective clothing and disposable filter dust masks may reduce exposure to blastomycosis spores. However, it has not been shown that such preventive measures will

reduce the risk of getting sick with blastomycosis. It is not considered practical at this time to recommend the wearing of masks in all settings in which exposure to blastomycosis spores could occur. There is no vaccine for blastomycosis.

For more information:

*Ontario Northwestern Health Unit at
1-800-830-5978 or 807-468-3147*

*In Manitoba, contact your doctor, your local Public
Health Unit or Health Links-Info Santé at
1-888-315-9257 or 204-788-8200.*



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Health Unit*

Manitoba 