

RADON: New Homeowners and the Law



What Is Radon Gas?

Radon occurs naturally when uranium breaks down in rock and soil. It is an invisible, odourless and tasteless gas.

When radon leaves the ground it is usually diluted in air and is relatively harmless. However, radon can seep into your home through small cracks and openings where the building contacts the soil. In some homes it can accumulate in higher concentrations, posing a health risk.

Radon testing is easy and techniques to lower radon levels are effective and can save lives.

When you move into a new home you should test for radon. If you find that radon is a problem, you may have legal avenues of redress from your New Home Warranty provider, or the architects, engineers and builders who built the home.

Radon and Your Health

Radon is naturally occurring radiation and when breathed in it can cause lung cancer. Radon gas is the #1 cause of lung cancer in

non-smokers. High radon causes approximately 3,360 deaths per year in Canada. Health Canada research estimates that with lifetime exposure at 800 Bq/m³, the lifetime lung cancer risk would be one in 20 for non-smokers, and one in three for smokers.

Health Canada has set a [National Radon Guideline](#) of 200 becquerels per metre (Bq/m³) for regularly occupied indoor spaces. Radon levels measuring more than 200 Bq/m³ can pose a risk to your health.

It is Easy to Test for Radon

The only way to know the radon level in your home is to test. It doesn't matter if your home is new—it can still have high radon levels.

About 7% of homes in Canada have radon over the National Radon Guideline of 200 Bq/m³. In some communities in British Columbia more than half of homes have high radon. Radon testing is easy and techniques to lower radon levels are effective and can save lives.

Health Canada has developed a [radon risk map](#) but more data is still needed to estimate radon risks for each community. Radon levels can be very different from home to home even within the same community, so your own home needs to be tested.

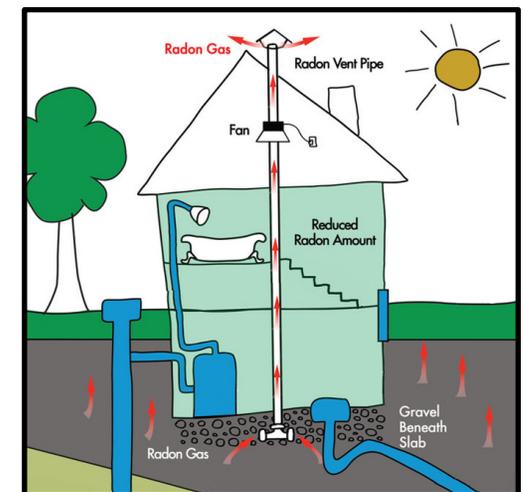
It is easy and inexpensive to test for radon using home testing kits that cost \$20 to \$60. These are available at leading retailers or from the British Columbia Lung Association at our [website](#), by email: info@bc.lung.ca or by phone: 604.731.LUNG (5864).

We also have a [Library Lending Program](#) which allows people in some communities to check out detectors from their library.

Avoiding High Radon: New Homes

If you are having a new home built, the building professionals that you hire (i.e. the builders and, contractors, engineers, architects, etc.) need to understand and comply with the BC Building Code. They are supposed to be aware of high radon and how to avoid it. If they aren't, they could make serious errors and be liable to you.

For instance, building professionals should know that elevated radon can be avoided in new construction by putting in a radon mitigation system. The best systems use "sub-slab depressurization". A hole in the building foundation and a vent pipe ensures low pressure on the ground floor does not result in radon being sucked into the space. Best practices in radon mitigation are described in Canadian General Standards Board (CGSB) [Radon control options for new construction in low-rise residential buildings, CAN/CGSB-149.11-2019](#)



Fixing High Radon

If the radon level in your house turns out to be higher than 200 Bq/m³ professional radon mitigators can put a system in place in one or two days. The [Canadian National Radon Proficiency Program](#) (C-NRPP) has lists of certified radon mitigation professionals by community.

New Home Warranty

The New Home Warranty is an insurance policy that covers homes constructed since July 1, 1999 by residential builders who are licensed with BC Housing.

There should be no serious disagreement that if the Building Code is not followed, this will count as a defect. Further, in our view, it is only a matter of time until homeowners make successful claims under the New Home Warranty for high radon.

Courts would most likely find high radon to be a defect in materials or structure for a number of reasons including:

- The National Radon Guideline provides a clear standard for health in a home
- High radon is considered to be a latent defect by [the Real Estate Council of BC](#). This means if a seller or their real estate agent know radon is a problem in a home, they need to tell buyers.
- What counts as a defect for a real estate transaction should also count as a defect under BC's *Homeowner Protection Act*.
- In Ontario, Tarion (the province's only home warranty insurance provider) [agrees that high radon is a defect](#).

Dispute Resolution Process: As a homeowner, if you find that there is a problem

with high radon in your home, the first thing that you should do is to contact your warranty provider and the builder to notify them of the defect. After the warranty provider receives your letter, they will arrange an evaluation.

If the warranty provider agrees that there is a defect covered by the New Home Warranty, they will arrange for repairs to be done, provide a written description of the work done, when it was completed and any new warranty insurance expiry dates that changed because of it. The warranty provider is the one that decides whether the original builder will fix the defect or whether they will get another contractor to do it.

If the warranty provider rejects your claim, they need to give you justification in writing. If you disagree with their decision, there is a mandatory mediation process.

If the New Home Warranty does not cover your home, you can try to resolve the matter through using the online **Civil Resolution Tribunal**, which covers small claims up to \$5,000.

Claims Under Negligence Law

If it is not possible to resolve the issue of high radon in your home through the New Home Warranty (i.e. because the expiry for the warranty ran out) or the Civil Resolution Tribunal, you may have the option to sue your builder or contractor.

Under the law of negligence, building professionals—engineers, architects, contractors— need to avoid acting in ways that can harm others. They need to ensure

the homes they build and design are safe. They owe a duty of care to future occupants.

If you feel that the building professionals breached their duty of care, you could file a legal claim so that they may have to pay you damages, including paying to repair high radon. If you develop lung cancer due to the professionals' negligence in not taking high radon into account, you may be able to sue them. You may be able to file a claim in negligence even after the Home Warranty legislation runs out. This will be a more complicated claim and it is advised to consult with a lawyer before proceeding.

Further Information

This is an abridged version of a more detailed legal opinion, titled **Radon: Liabilities in Construction Law** which includes further information, resources, and legal analysis. To learn more please visit our website on [Radon: Rights and Duties](#) or contact us at healthyindoor@bc.lung.ca



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