Fisher Laboratory Overview: **Determining Your Analytical Needs**

Finding the Problem is Paramount

Fisher's CALA-Accredited Laboratories is equipped to analyze **hundreds of the most common organic and inorganic contaminants** found in today's environment whether in soil, groundwater or airborne.

Our chemical and analytical services can be divided into **three primary elemental categories**:

Air:	Air Quality (especially indoor)
Water:	Groundwater, Watershed, Aquifers (wells)
Earth:	Soil, Sediments, Materials (e.g. building materials)

How do we Measure Contaminants?

The lab uses numerous current state-of-the-art methods to analyse substances. We have listed examples in the *What do we Analyze* section of our website. Contact us if you require further specifics about substances or our procedures. However, we offer a brief overview to show you the complexity involved in solving your problems.

Differential Testing - it may not be what you think!

At times we will measure a different element, such as water in order to establish a problem with the soil. We may test a building material to verify a problem with the air you breathe. Examples of this differential testing happens due to leaching of substances into the earth or how airborne a material might be if disturbed.

Therefore, the **substance collected and tested (air, water, earth/material) is not necessarily the elemental indicator of the actual problem** posed to humans or the environment. Some substances can be collected through more than one element such as both soil and water.

Typically more than one substance is collected for testing when contamination is suspected.

To determine a final problematic outcome, the materials to be tested on site must normally be established by a trained professional.

Vermiculite as a Simple Example

A test that analyzes a **common building material vermiculite** may show resulting asbestos content. If disturbed and it becomes airborne, the exposure to the disturbed vermiculite material containing asbestos, is extremely dangerous. The material affects the air. Therefore, **we will test the vermiculite substance, and follow-up with an air test after the removal to ensure safe air quality.**

The Process – Collecting Samples & Testing

Again, typically a professional is contracted to identify a material(s) that could be harmful (whether indoor or outdoor) on the property or on an adjacent property. Properties may be small- or large-scale. All environmental engineers, including Fisher Engineering, will establish whether an onsite problem exists with the help of chemical analysis offered by a laboratory.

Samples must be collected carefully and through specific procedures. These engineers or other professionals are trained to do so. With large development projects or property purchases an Environmental Assessment is contracted which includes management of the entire project from start to finish. Project managers lead the collection through onsite investigations, wells, and bore holes, which are ultimately tested. These laboratory tests are always part and parcel of both the project and solution and well as post solution monitoring.

On smaller projects, including home owners, builders often encounter and are trained to be on the lookout for mould, asbestos or lead. Many know how to collect suspected samples and can drop these off to a lab. Our Fisher Lab accepts such requests.

When professionals such as property owners and even contractors find themselves in a bind and/or are not trained to collect samples, they will usually outsource this service. This is also where Fisher can help, either with a full audit or with the collection and an analysis of a suspicious material that is unexpectedly uncovered.

Because of strong regulations, contractors and all property owners must legally ensure job site safety.

Independent and Together

In conclusion, Fisher's laboratory acts as an independent service provider to analyze client samples for engineers, developers, builders, contractors, property managers, insurance companies… and even home owners. We can collect samples for you or you can drop these off to our location in Markham stating your preferred response time.

Over time, we have built our own solid reputation as a laboratory and would welcome you to try our service. We are personal and are happy to chat about your needs.

Because our laboratory is located in-house with Fisher's engineering team, our service is automatically extended to our internal team projects. This allows for quick response with all contamination analysis or management programs often designed for medium- to large-scale projects and diverse client property needs.

Here we often act behind the scene since project managers are assigned to interact with you more personally about all aspects concerning your project solutions.

Whether you come to us through Fisher's engineering team, or by independent means, we always offer you quality service and accredited analysis with solid solutions or recommendations. We pride ourselves with a friendly and personal approach – you can contact us and we answer! PLUS:

No Client is too small

Education

This article, as an example, offers an overview of our lab as well as general information around environmental analysis. We attempt to make all our *Fisher Files* accessible and understandable, since we don't know where you are in your journey

We particularly aim to educate those starting out with property investments or new to the field by profession such as real estate, building, management and financing.

Browse through our other Fisher Files for more information on specific contaminates such as Asbestos and Mould.

You'll find us at: *fishereng.com*.