What is Bioimpedance Analysis?
(And why do you need one?)

Bioimpedance analysis (BIA) is a valuable tool for measuring your body composition—the measurement of body fat in relation to lean body mass. It is an important part of any comprehensive health and nutrition assessment.

Why is body composition important to your health?

A normal balance of body fat to lean body mass is associated with good health and longevity. Excess fat in relation to lean body mass, a condition known as altered body composition, can greatly increase your risk of cardiovascular disease, diabetes, and more. BIA enables early detection of an improper balance in your body composition, which allows for earlier intervention and prevention. BIA also provides the measurement of fluid and body mass that can be a critical assessment tool for your current state of health.

BIA serves to measure your progress as you work to improve your health. Improving your BIA measurement, or maintaining a healthy BIA measurement, can help keep your body functioning properly for healthy ageing and reduced risk of illness. With your BIA results, we can recommend a personalized dietary plan, nutritional supplements, and exercise to help support optimal health and well-being for a lifetime.

How does BIA work?

BIA is much more sophisticated than your bathroom scale, but just as painless-and almost as quick. BIA is a simple procedure performed in our clinic in a matter of minutes with the help of a sophisticated computerized analysis. Measurements are taken with the bioimpedance analyzer, which uses electrodes similar to EKG electrodes. The analyzer calculates your tissue and fluid compartments using an imperceptible electrical current passed through pads placed on one hand and foot as you lie comfortably on a treatment couch. Lean tissue, which is over 70% water, is a good conductor of electrical current. Fatty tissue, which is low in water, is not. Thus, the resistance to the flow of electrical current measured by the analyzer can be used to calculate the body composition. Optimal body fat ranges from 15% to 25% for women and 10% to 20% for men.

Over 100 independent studies conducted over the past 20 years have demonstrated that BIA can provide an accurate and clinically useful assessment of body composition.