

# What is Metabolism and Why Measure?

## What is your resting metabolic rate (RMR)?

Your RMR is the total number of calories that your body burns at rest (sitting & sleeping) and represents 70-80 percent of your total daily calorie needs.

## Why measure your resting metabolism?

Everyone's metabolism and caloric needs are different. Your body's metabolism is affected by genetics, age, gender, height, weight, body composition, health, activity level, and type of physical activity. Online calculators use algorithms to calculate your RMR which are not always accurate.

The best way to know to get your RMR is to measure it. Measuring your RMR is another way to track your progress. It is great indicator that you are building muscle and increasing your VO2 max.

## What are we measuring?

We are measuring your VO2 which is the rate at which your body exchanges oxygen at rest. This number is directly related to your VO2 max which is the body's maximum rate of oxygen exchange. As you increase your VO2 max through interval training and build muscle through strength training, you in turn increase your VO2. Note: We recommend testing your RMR every 6 months in order to track your progress.

## How can you increase your RMR?

The best way to increase your RMR is through high intensity interval/strength training or a combination of both. High intensity Interval training increases your VO2 max which in turn increases your VO2. Muscle is metabolically active even when you are at rest, so as you build muscle it also increases your VO2.

## Things that slow your metabolism that may need to be addressed:

- Insulin resistance
- Low vitamin D
- Malabsorption or Food Sensitivities
- Toxins in processed food, diet foods and alcohol

## Measured RMR vs. Calculated RMR

When RMR is calculated by estimations it is subject to significant error – as much as 20% to 25%.

**RMR comparison as determined by estimate vs. metabolic measurement of subjects of same height, weight, gender and age.**

Calories:					
Estimation	1724	1740	1743	1744	1743
Measured	1263	1523	1778	1979	2252
Difference	-461	-217	+65	+235	+509

\*Foster, GD et al; *Metabolism* 1988; 37 (5): 467-472