

# The Gut Microbiome

The gut microbiome is the totality of microorganisms, bacteria, viruses, protozoa, and fungi, and their collective genetic material present in the gastrointestinal tract (GIT)



The gut microbiome is home to trillions of bacteria, viruses and fungi, all of which collectively play an important role in maintaining good health. In simplistic terms there are two types of bacteria, harmful and good bacteria. Maintaining a healthy balance of these bacteria in the gut is important for healthy digestion and a strong immune system.

Whilst there is still much to uncover about the gut microbiome it has been observed that overweight and obese individuals have a more unbalanced microbiome compared to lean individuals (1) and often have a higher ratio of certain bacteria called Firmicutes and Lactobacilli, versus Bacteroides.

Metabolic dysregulation is often associated with a disruption of gut bacteria, called dysbiosis (2) and so supporting the gut microbiome is a key area of focus in nutrition.

## Diet & Nutrition

There is growing evidence to support the beneficial effects of targeting the gut microbiome to support weight management and metabolic syndrome (3).

BANT nutrition practitioners assess and identify potential nutritional imbalances to understand how these may contribute to an individual's symptoms and health concerns.

Practitioners consider each individual to be unique and recommend personalised nutrition and lifestyle programmes rather than a 'one size fits all' approach.

1. Sivamaruthi, B. S., Kesika, P., Suganthy, N. & Chaiyasut, C, A Review on Role of Microbiome in Obesity and Antiobesity Properties of Probiotic Supplements. Biomed Res. Int. 2019, 3291367 (2019).
2. <https://www.nutrition-evidence.com/article/29672196?term=prebiotic%20gut%20microbiota>
3. Mohsen, M. et al. Gut microbiome and metabolic syndrome, Diabetes & Metabolic Syndrome: Clinical Research & Reviews Volume 10, Issue 2. Supplement 1, April–June 2016, Pages S150-S157

