

# THE FOOD AND MOOD CONNECTION

## CHOOSE FOODS THAT KEEP THE GUT DIVERSE IN MICROBES AND GOOD BACTERIA

By Angela Wallace, MSc, RD

We all know that the type and amount of food we eat can influence how your body feels, but did you know that our eating patterns and behaviours can also influence our mood? So much so that our gut microbiome is now being known as our second brain!

Have you ever had a gut feeling? Perhaps it helped you make a really important decision in your life, or gave you butterflies during a first kiss, or made you feel ill when something terrible happened. Our gut feelings are a perfect example of how connected our brain and gut is, we can actually feel our emotions in the gut. In fact, our gut is directly responsible for 90% of the serotonin produced in our body.

Serotonin is also known as the 'feel good' chemical, it plays a role in regulating your mood, sleep, appetite, digestion, memory, and even sexual drive. Serotonin has also been linked to depression. Now, the research isn't sure if depression leads to lower levels of serotonin or whether lower levels of serotonin cause depression, but we know they are connected. So the important question is...what happens if our gut is unhappy?

We know that having more diversity in your gut has been linked to better health outcomes (less allergies, asthma, diabetes, obesity, mental health, etc.) We also know that a westernized diet (high in processed foods, refined sugars and grains etc.) leads to less microbial diversity in the gut. Various studies have shown associations between a westernized diet and increased risk of depression.

The good news is our gut diversity is constantly developing and changing. This means that regardless of the food choices you've made in the past, you have the opportunity to improve the health of your gut by making better food choices now.

### So what should you be choosing?

#### 1. More fibre

We know that gut microbiome diversity is key in maintaining a healthy gut and mind. We can help keep a diverse gut by feeding our microbes. Our microbes eat the food we cannot digest ourselves (aka fibre). However, the average Canadian gets less than 50% of the fibre recommended each day. So, essentially our microbes are hungry.

### *Tips on getting more fibre in the diet:*

Focus on eating more fruits and veggies each day. A recent study from the American Gut Project found that participants who reported consuming  $\geq 30$  different types of plant species each week had greater microbial diversity than those who reported consuming  $\leq 10$  types of plant species weekly. Whether you ate meat or were vegan didn't seem to have much an effect, as long as you ate a high amount of plants.

**Bottom line:** eating a variety of fruits and vegetables and other plant based foods (e.g., nuts and seeds) is important to your microbial diversity. In addition, we know that more fruits and vegetables in the diet is associated with other health benefits, including reduced risk of chronic disease.

### *How do you get more fruits and veggies?*

- Plan meals around veggies and fruits – we tend to plan our meals around the protein source. Why not shift your perspective on mealtime and focus on planning it around the vegetable? What veggies do you have in the fridge that can be used to make your meals this week?

- Make it easy – encourage your clients to do what they need to do to make it easy. Do they need to choose canned beans, or buy pre-packaged salads? Do they need to buy a raw veggie dish or perhaps spend an hour each week pre-cutting their fruit and veggies? Make the healthy choice the easy choice!
- Think half your plate – fill half your plate with fruits or veggies at each meal. For example, having a smoothie loaded with fruit or veggies for breakfast, having grilled veggies at dinner, or having veggies and dip for a snack.

Other ways to boost your fibre intake:

- Choose whole grains
- Add more legumes to the diet

## 2. Probiotic rich food

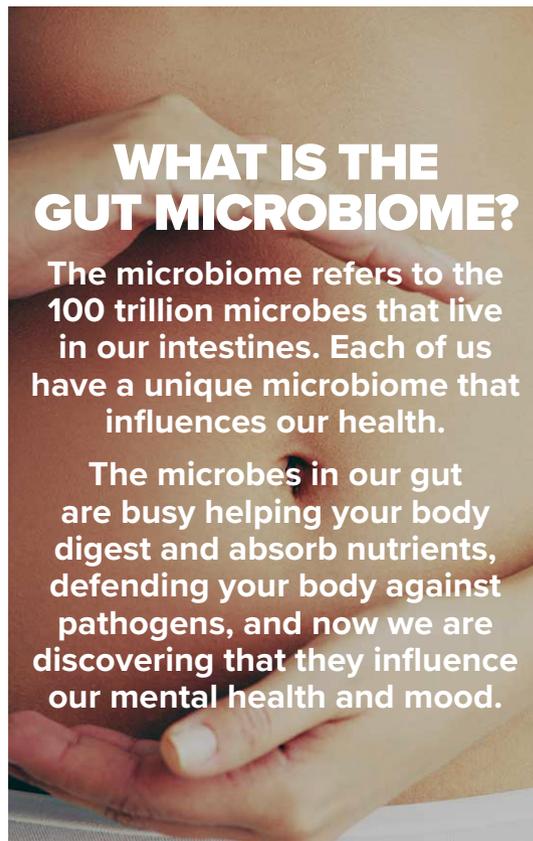
Probiotics are the good bacteria. To help improve diversity we want to keep growing our guts ecosystem and replenishing it

with healthy bacteria. Research has shown probiotics to be helpful with improving IBS symptoms, constipation, supporting immunity when taking medications, and now it's being linked to mental health. Now, this doesn't mean you should recommend a probiotic supplement to all your clients, but instead have them focus on including more probiotic rich foods to their diet.

Your clients can eat these probiotic rich foods to help promote diversity in their gut:

- Kefir
- Yogurt
- Tempeh
- Miso
- Kimchi
- Fermented veggies (e.g., sauerkraut)
- Kombucha

Your gut helps keep you healthy and happy. Help it stay happy by focusing on getting more fruits, veggies, and fibre in your diet.



## WHAT IS THE GUT MICROBIOME?

The microbiome refers to the 100 trillion microbes that live in our intestines. Each of us have a unique microbiome that influences our health.

The microbes in our gut are busy helping your body digest and absorb nutrients, defending your body against pathogens, and now we are discovering that they influence our mental health and mood.

# WARM LENTIL ARUGULA SALAD

By Angela Wallace, MSc, RD



Salads are a great way to load up on veggies, but I know they can get boring. This fall, get creative with your salads, perhaps including warm components like sautéed veggies or roasted squash to help keep things interesting. The contrasting textures and temperatures from raw and cooked veggies make for a super tasty meal.

This warm lentil and mushroom salad is loaded with fibre and lots of prebiotics to help feed your good gut bacteria. This salad will definitely make your gut microbes happy. Feel free to use the veggies I suggested or anything else you might have in the fridge. Have fun with it!

### MAKES 4-6 SERVINGS

#### Ingredients:

- 8 cups arugula
- 2 cups cooked lentils (can be canned, drained, and rinsed)
- 2 cups white or cremini mushrooms
- 1 tbsp. vegetable oil
- 2 cloves of garlic, minced
- 2 tsp. dried thyme
- 1 white onion, sliced (optional)
- ½ cup goat cheese (optional)

#### Dressing:

- ¼ cup balsamic vinegar
- 2 tbsp. extra virgin olive oil
- ½ tsp. cinnamon
- Salt and black pepper to taste

#### Directions:

1. In a medium-high skillet warm vegetable oil and add onion. Begin to sauté for 1-2 minutes. Add mushrooms and garlic and continue to sauté.
2. Add salt, black pepper, and dried thyme for seasoning.
3. Sauté for 4-6 minutes or until mushrooms have browned and onions become translucent.
4. In a large bowl, mix together

arugula, lentils, mushroom and onions. If you enjoy adding cheese to your salad, add in some crumbled goat cheese.

5. In a separate small bowl, whisk together oil, vinegar, cinnamon, salt, and black pepper. Pour over salad and toss well.



Angela Wallace is a registered dietitian, nutritionist, family food expert, and certified personal trainer (PTS). She specializes in women's

health, with a focus on weight loss and digestive conditions. She uses a 'non-dieting approach' with her ultimate goals being to help people find a balanced lifestyle and healthy relationship with food.