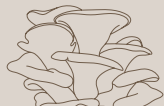
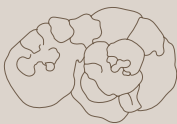
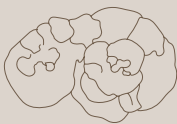




# MARVELLOUS MUSHROOMS







# MUSHROOMS: MUNDANE MATTER OR MEDICINAL MARVELS?


**Mushrooms have an ancient history of use. In traditional cultures, they have been eaten and used medicinally to support wellbeing for thousands of years!**

While mushrooms may have been underappreciated or misunderstood by some societies, today fantastic fungi are becoming increasingly researched and recognised in contemporary culture for their holistic health benefits.

Although commonly considered a vegetable, mushrooms are neither plants nor animals. Mushrooms are fungi, belonging to a separate kingdom of their own. While all mushrooms are fungi, not all fungi are mushrooms! Yeasts and moulds also run in the same fungal family.

You might be most familiar with the popular, culinary varieties of mushrooms found at the grocery store or farmer's market, such as button, portobello, oyster or shiitake. But these are just a 'taste' of the wide world of mushrooms...

While most mushrooms are edible, few are actually consumed for their flavour; many species can be too tough to eat, with an unpleasant taste, texture or smell. Instead, these mushrooms have historically been used for their medicinal properties. Various other types of mushrooms are hallucinogenic, and a small percentage are even poisonous!



# WHAT'S SO MARVELLOUS ABOUT MUSHROOMS?

Mushrooms are great sources of carbohydrates and protein. They contain all 9 essential amino acids – rare for plant-based proteins. They are high in fibre, most notably beta-glucans, a type of carbohydrate.

Mushrooms are also rich in nutrients and antioxidants, which help neutralise and protect your body from harmful free radicals that can cause damage to cells.

While the specific nutritional composition and medicinal benefits can vary depending on the type of mushroom, fungi are fabulous at supporting general health and wellbeing due to their overall abundance of many nifty nutrients:

- ✓ **Carbohydrates > fibre > beta-glucans**
- ✓ **Protein**
- ✓ **Antioxidants**
- ✓ **Vitamin D**
- ✓ **B Vitamins:**
  - *Niacin*
  - *Pantothenic acid*
  - *Riboflavin*
  - *Folate*
  - *Biotin*
- ✓ **Choline**
- ✓ **Essential minerals:**
  - *Selenium*
  - *Copper*
  - *Phosphorous*
  - *Potassium*

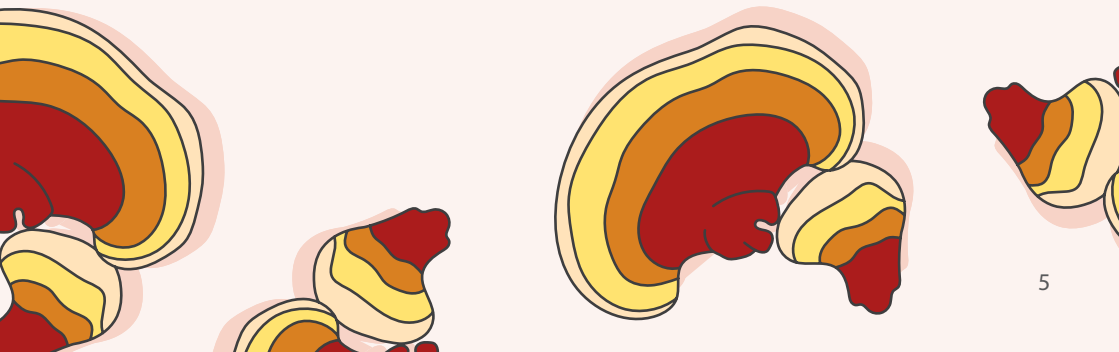
# WHAT MAKES MUSHROOMS MEDICINAL?

Certain mushrooms can provide health benefits above and beyond the provision of essential nutrients. Those that are too tough to eat, such as Reishi mushrooms, are used solely for medicinal purposes. These types are also known as “medicinal mushrooms” or “functional mushrooms.”

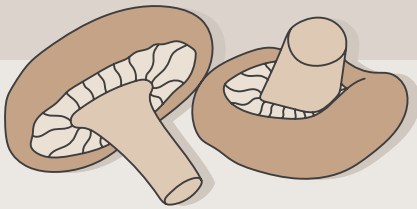
The medicinal value of particular mushrooms is thought to be due to their concentrations of bioactive polysaccharide compounds called beta-glucans that can play a key role in supporting many of the body’s processes. Each type of medicinal mushroom contains signature polysaccharides thought to be responsible for their therapeutic benefits. These plant chemicals and components may

exert antioxidant and anti-inflammatory effects and stimulate the activity of immune cells to support immune health. While each mushroom is unique and has different beneficial properties, they can all help to maintain general wellbeing.

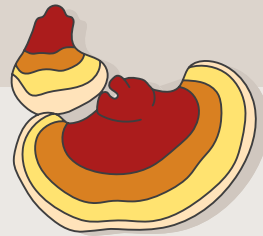
Mushrooms are used in traditional Chinese medicine to support energy levels, vitality and a healthy immune system, and some are used as adaptogens, which help the body to respond to stress. Ask your health professional for more information about the different types of medicinal mushrooms, their potential health benefits and whether they may be suitable for you.



# 10 TYPES OF MEDICINAL MUSHROOMS



SHIITAKE



REISHI



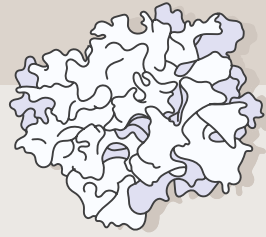
CORDYCEPS



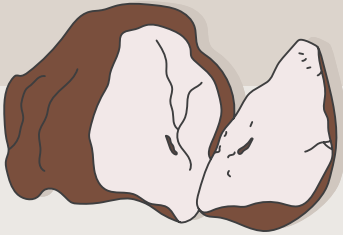
LION'S MANE



**MAITAKE**



**SNOW FUNGUS**



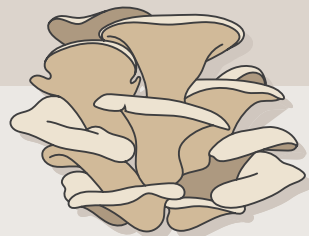
**PORIA**



**TURKEY TAIL**



**CHAGA**



**OYSTER**



# CONSIDER CULTIVATION

**Where a mushroom is grown – on wood or grain – makes a distinct difference to its medicinal properties.**

While the primary bioactive polysaccharides found in mushrooms are beta-glucans, they also contain alpha-glucans in small amounts. In nature, mushrooms contain high levels of beta-glucans. However, sometimes faster and cheaper production methods are employed by growers that involve cultivation on grains or sawdust. This production method is believed to result in high levels of alpha-glucans and only low levels of beta-glucans.

Ideally seek to source medicinal mushrooms that have been grown on wood or in the ground to receive the most potent polysaccharides!





# EXTRACTION IS ESSENTIAL

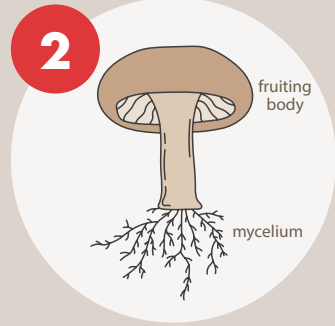
Mushrooms that are not immediately edible require extraction methods in order to reap their bounty of benefits. A mushroom extract is made by soaking raw mushroom matter in a solvent, such as alcohol or hot water, to draw out its bioactive parts.

Dual extraction, using both hot water and alcohol, is an effective method to obtain both the water-soluble constituents, such as beta-glucans, as well as the alcohol-soluble constituents, such as triterpenes, thus providing more active ingredients to exert their effects.

# A FEW FACTORS THAT INFLUENCE THE MEDICINAL MIGHT OF MUSHROOMS:



**Where it's grown –**  
on wood or grain



**The part of the mushroom used**  
– fruiting body or mycelium








**Extraction method used –**  
water or alcohol



**Ratio of raw material**  
to concentrated extract



# RECIPE IDEAS

-  Mushroom + noodle hot pot
-  Roasted mushroom + walnut spread
-  Mushroom risotto
-  Wild mushroom soup
-  Mushroom veggie burger

## Uncover Umami

Umami is one of the five basic tastes. It's described as the savoury or meaty taste of foods that deepens flavour – think beef brisket, soy sauce, ripe tomatoes, Parmesan cheese – and mushrooms!

Mushrooms are a rich source of umami. The darker the mushroom, the more umami it contains. The unique umami flavour that mushrooms impart can replace some of the salt called for in recipes – a bonus health benefit.

### Disclaimer

The information in this booklet is generic in nature. Please consult your healthcare practitioner for guidance regarding your individual condition and specific symptoms, and before making any diet or lifestyle changes. Vitamin and nutrient supplementation should not replace a balanced diet. For any questions, please talk to your healthcare professional.



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