

Food Allergies and Special Diets



- It seems like food allergies are becoming more common lately. About 2.6 million people in Canada report having a food allergy. The way to find out if you have an allergy is to get an allergy test. Your doctor can refer you to an allergist to get this done.
- One theory as to why there are so many more allergies now, is the 'hygiene hypothesis'. Basically, we've gotten to a point where we live in such clean and sanitized environments that we are exposed to fewer germs than in the past. Now our immune systems mistakenly identify certain foods as harmful. Another thing is that it seems that our genetics play a role too. If a parent has an allergy, it is more likely that their child will also have an allergy.
- It is estimated that about 2% of Canadians have an anaphylactic allergy. Anaphylaxis is a serious allergic reaction that is rapid in onset and life threatening. Many processed or pre-prepared foods contain allergens, and we are all eating more and more processed foods. So, if a food label says "may contain", don't risk it!
- Aside from allergies, people are also choosing to omit certain types of foods more often, for many different reasons. Can you think of some reasons why? For some, it is for health reasons, environmental reasons, religious reasons, etc. Let's look at some of these special diets and food allergies in more depth!



What's the difference between an Allergy and a Food Intolerance?

Allergy	Intolerance
<p>An immune system response to a protein in food.</p> <p>For example, a peanut allergy. An anaphylactic reaction is the most severe type of allergy; may cause death.</p>	<p>An unpleasant reaction to a food.</p> <p>For example, lactose intolerance (intolerance to the lactose, the natural sugar in milk).</p>
<p>Reaction happens in respiratory (breathing/lungs), digestive system (stomach, intestine), skin or cardiovascular system (if anaphylactic).</p>	<p>Reaction usually happens in the digestive system.</p>
<p>Wheezing Hard to breathe Vomiting Diarrhea Skin rashes Hives Rapid heartrate Low blood pressure</p>	<p>Bloating Gas Diarrhea Cramps</p>
<p>Peanuts, tree nuts (Brazil nut, hazelnut, pistachio, pine nuts, walnuts, pecans, cashews, macadamia nuts), eggs, milk, fish, sesame, wheat, soy</p>	<p>Can be to any food (milk, gluten, citrus fruit, strawberries, etc.)</p>

So what can we do when working with community members?

- Ask in advance if anyone has food allergies
 - Let people know if recipes or meals contain allergens so people can avoid foods that cause a reaction (e.g. place a tent card next to a dish, that lists allergens)
 - Read food labels (triple check): (1) once at the store before you buy, (2) once when you put the food away, and (3) again before serving or eating the food. This may be a bit of work since there are so many names for things like 'gluten' or 'milk' but you can visit www.foodallergycanada.ca for more info.
- ** Be careful when buying foods from outside of Canada, since the rules are different for labeling.
- Remind folks to bring their Epi pen (does your centre have one on hand?)
 - Wash your hands frequently and encourage others too as well (...I made a peanut butter sandwich this morning, while I checked the weather on my cell phone. Now I'm touching my cell phone before going into a classroom)
- ➔ For someone with an allergy or intolerance:
- If ordering food, ask the caterer or restaurant about specific allergen ingredients
 - Modify a recipe so that the food they're avoiding is not in the recipe
 - Make sure to include another option that doesn't have the food they're avoiding in it
 - If preparing food, make sure you do not use the same cutting board, knives, bowls etc. for multiple foods unless they are washed in between use. Use a different dish cloth to wash utensils that have touched allergen products - this is key when someone has a serious allergy



Sometimes you can just modify a recipe you already have and sometimes you may have to find a new recipe. For example, if you have to swap out 4 of the 5 ingredients in a recipe (especially baking), the final product might not look anything like it's supposed to. In that case, maybe you'll have to find a new recipe altogether.

Common Dietary Restrictions

Here are some types of dietary restrictions that you may have to consider.



In general, vegetarians do not eat animal meat. Vegetarians often eat eggs and dairy products.

Some vegetarians also eat fish and poultry.

What's excluded from their diet?

Beef

Pork

Wild game

Seafood

Fish

Chicken

Turkey

Meal ideas:

These meals and snacks don't have to be for vegetarians only! We can all benefit from meatless meals once in a while and so can our planet.

- Casseroles made with beans or lentils, rice, corn, and tomatoes*
- Vegetarian chilli*
- Vegetarian lasagna made with a layer of roasted vegetables*
- Burritos or tacos made with kidney beans, black beans or refried beans instead of ground beef*
- Stir fries made with tofu, vegetables, and nuts – enjoy with whole wheat couscous or brown rice*
- Baked beans in tomato sauce with molasses served with toast, vegetables and dip*
- 'Meal salads' made with leafy greens, chick peas, white or red kidney beans, nuts, vegetables, pasta, rice, or barley*
- Soups made with lentils, beans, and vegetables – serve with whole grain bun or crackers*

- Greek bean salad stuffed into a pita*
- Stew made with vegetables and tofu or beans*
- Vegetarian burger with carrot and celery sticks*
- Egg salad sandwich on whole grain bread or a bun. Or try a ‘chickpea salad’ sandwich instead (it’s even easier to make than egg salad!)
- Omelettes or frittatas made with vegetables such as asparagus, broccoli, mushrooms, sweet peppers, and onions – serve with whole grain bread or toast and a glass of milk or fortified soy milk

Snack ideas

- Hummus made with chick peas served with whole grain pita bread or vegetables (carrots, celery, cucumber etc.)
- Peanut or almond butter on whole wheat crackers or pita with banana or apple slices*
- Smoothie with a banana, frozen berries and soy milk*
- Unsalted roasted almonds*
- Yogurt and granola or fresh fruit

Visit <http://www.unlockfood.ca/en/MenuPlanner.aspx> for recipes and ideas! Select ‘Eat right the vegetarian way’ as your goal for a 7-day meal plan with recipes.

The above vegetarian meals with an asterisk (*) can also be made vegan as long as no animal-based broths or sauces, cheese, milk or eggs are used. If you buy premade items (like granola bars, pasta sauces etc.), just make sure that there are no animal products in the ingredient list.



Vegans do not eat any animal products.

What's excluded from their diet?

Beef	Pork	Wild game
Seafood	Fish	Chicken
Turkey	Honey	Eggs
Dairy (cheese, milk, yogurt)	Gelatin (in Jell-O, some candies, marshmallows etc.)	

Meal ideas:

- Lentil soup with a whole grain bun
- A wild rice (or brown rice) casserole with lentils, beans or chickpeas
- Chickpea or lentil curry
- Black bean spread on a sandwich with avocado and lettuce
- Bean burrito in a wrap with a salad or cut up vegetables
- Bean salad with rice or quinoa
- Chickpea flour dumplings
- Pasta dish with vegetables and tomato sauce
- Stir fry with vegetables and tofu, paired with rice or noodles.
- Chickpea salad sandwich and soup
- Stew made with vegetables and tofu or beans
- Black bean burger (or chickpea burger) with carrot and celery sticks
- Chickpea flour 'omelet'

Snack ideas:

- Soy milk (or almond, rice or coconut milk) based smoothies
- Dried fruit with nuts (walnuts, almonds, peanuts etc.) and seeds (sunflower, pumpkin, sesame)
- Granola bar
- Whole grain crackers and nut butter (almond, peanut, soy nut etc.)



“Wheat Free” and “Gluten Free” are not the same thing.

Wheat (kamut, spelt, bulgur, couscous), rye and barley all contain a protein called gluten.

Not all wheat free foods are gluten free. Someone on a ‘wheat-free diet’ may still eat gluten.

Wheat Allergy:

A wheat allergy is a reaction that involves your body’s immune system. It occurs when your immune system thinks that the wheat proteins are harmful and triggers different symptoms. A wheat allergy does not cause any permanent damage to the intestines.

*An exception to note: Barley and rye are wheat free but do contain gluten.

Gluten-Free:

Some people choose not to eat gluten, as a personal choice or because they find it does not agree with them.

People diagnosed with celiac disease cannot eat gluten because it damages their small intestine. This makes the body less able to absorb many important nutrients. Celiac disease is an autoimmune disorder.

Symptoms may include diarrhea, fatigue, bloating, weight loss, and anemia. Eating gluten does not lead to anaphylaxis for people with celiac disease.

What's excluded from their diet?

Barley	Wheat (including couscous, bulgur, spelt and kamut)
Rye	Triticale (hybrid of wheat and rye)

Oats are naturally gluten free but often become contaminated when they're processed. You can find pure oats that are uncontaminated with gluten.

Foods that contain these grains, such as pasta, cereal, bread, pizza, crackers, cookies and cake, must also be avoided.

Gluten can hide in certain foods like:

Condiments (soy sauce, oyster sauce), processed meats (sausages, deli meats), meat alternatives (veggie burgers, seitan, vegan cheese), store bought foods (chocolate, soup, sauces), some restaurant foods (some places make their scrambled eggs fluffy by adding pancake mix) and sweeteners (malt syrup or brown rice syrup aka "caramel colour" may contain barley enzymes; often used in candies and granola bars).

It is also in some cosmetics and body care products like creams, soaps etc. It will be absorbed through your skin and cause the same reaction as if you'd eaten it.

Gluten free grains and their flours:

Amaranth	Millet	Sorghum
All bean-based flours (soy, chickpea, lentil, fava etc.)		Quinoa
Buckwheat (actually a seed, not a grain. Toasted buckwheat = kasha)		
Teff		

Potatoes and sweet potatoes, rice (brown, white, wild rice), beans peas lentils, corn, Soba noodles (100% buckwheat)

Meal Ideas:

- Burrito on a salad with quinoa (can also purchase gluten-free wraps)
- Bean salad with quinoa or buckwheat (buy 'kasha' buckwheat, not raw buckwheat to save a step!)
- Casseroles made with beans or lentils, rice, corn, sweet potatoes, and tomatoes etc.
- Vegetarian or meat chilli
- Omelettes or frittatas with potatoes
- Stir fries made with tofu or meat; vegetables and nuts – enjoy with soba noodles
- Baked beans in tomato sauce with molasses served with potatoes, vegetables and dip
- 'Meal salads' made with leafy greens, chick peas, white or red kidney beans, nuts, vegetables, rice, or quinoa
- Soups made with meat or meat alternatives, and vegetables
- Potato salad with vegetables, soup and grilled chicken or fish
- Stew made with vegetables and meat or beans

Snack Ideas:

- Fresh fruit
- Dried fruit with nuts (walnuts, almonds, peanuts etc.) and seeds (sunflower, pumpkin, sesame)
- Hummus made with chick peas served with vegetables (carrots, celery, cucumber etc.) or gluten-free crackers
- Peanut or almond butter on apple or banana slices
- Smoothie with a banana, frozen berries and a splash of orange juice
- Unsalted almonds, plain or roasted with rosemary or smoked paprika
- Yogurt and granola *(check the label or make homemade using gluten free oats) or fresh fruit

Gluten and Baking:

One thing to note is that the texture of breads or baked goods that are gluten free often have a different texture. They often won't rise as much.

Try cooking on a lower temperature for a longer time to get things to rise a bit more. You can even add an extra egg to your recipe to help it rise more.

If these items are store bought (not made from scratch), read the label or ask at the store.

Adjusting Recipes

Make sure to speak with the person who has the allergy. It is best not to risk substitutions if there is potential for cross contamination for someone who has an anaphylactic allergy.

Common allergen	Substitution options
Milk	Almond milk Cashew milk
Butter	Soy milk (the calorie, fat, fortified vitamin D and calcium content is closest to cow's milk) Rice milk
Yogurt	Coconut milk Margarine (check label!) Coconut based yogurts and ice creams



Common allergen	Substitution options
Eggs	<p>For binding: 1 tbsp ground flax + 3 tbsp warm water, let stand 5-10 min Applesauce (¼ cup) Pureed sweet potato (¼ cup) Yogurt (¼ cup) Mashed banana (half)</p> <p>For leavening: 1 ½ tbsp. veg oil + 1 ½ tbsp. water + 1 tsp baking powder</p> <p>You can buy a premade egg replacement. You can try using chickpea flour instead of an egg to make an omelette.</p>
Gluten containing grains	<p>Rice- brown, white, wild Potato, Teff, Amaranth, Buckwheat, Millet, Corn, Sorghum, Quinoa</p> <p>Oats are gluten free but often become contaminated during processing; if someone has celiac disease, look for uncontaminated oats at the store.</p> <p>Instead of regular flour, you can buy gluten free flour or make a mix yourself- 4.5 cups white rice flour + 1.5 cups potato starch + ¾ cup tapioca flour</p> <p>Snacks- rice cakes, corn tortilla chips, rice crackers, popcorn</p>



Common allergen	Substitution options
Peanuts	Sunflower seed/ butter Soy seeds/butter Hemp butter/seeds Hummus (similar protein content) Almond butter * if no tree nut allergy
Tree nuts	Peanuts Sunflower seeds Pumpkin seeds Roasted soy beans Sesame seeds *if no peanut allergy

If someone has a peanut allergy, watch for these foods:

- Asian foods with peanut sauce or Szechuan sauce
- Bulk foods (cross contamination can happen)
- hydrolyzed plant/vegetable protein
- peanut oil/butter
- potato chips (some brands use peanut oil)
- salad dressings that list oil (may be peanut oil)



A note on soy

The food industry has many uses for soy. Consequently, soy and soy products can be found in a number of convenience foods from canned soups, sauces and condiments.

We know that eating soy in its whole form (not in supplement form or soy additives in processed foods) is protective against breast cancer, helps us control blood pressure, reduces cholesterol and can help with symptoms of menopause.

Whole form soy includes: tofu, soy milk, tempeh, soybeans, edamame, miso

Labels in Canada

There are some new rules for food labelling in Canada.

Priority allergens must always be declared on labels. Added food allergen and gluten sources must be declared when present at any level.

Plain language words must be used as follows:

Ingredients: flour (wheat), butter (milk), liquid albumin (egg), apricot jam with pectin, vegetable oil (soy), sugar, flavour, sulphites*.

The statement “contains” must appear right after the list of ingredients for the food as follows:

E.g. Ingredients: flour, butter, liquid albumin, apricot jam with pectin, vegetable oil, sugar, flavour.
Contains: wheat, milk, egg, soy, sulphites.



Did you know?

20% of kids will outgrow their peanut allergy by school age.

Q&A: Pregnancy, Babies and Allergens

Q. Should you avoid allergens (nuts, fish, wheat) during pregnancy?

A. Nope. As long as mom is not allergic to the food, she can eat common allergenic foods. (Pregnant women should avoid soft cheese, deli meats and raw fish – that is for food safety reasons).

Q. When should you introduce food allergens to babies?

A. To decrease the chance of your baby developing an allergy, introduce foods containing the most common food allergens – peanuts, seafood, sesame, soy, tree nuts, wheat and eggs – early and serve them often. Introduce allergen foods as soon as your baby starts to eat solids.

Avoid offering more than 1 of these foods per day and wait 2 days before you introduce another common food allergen.

Q. Why should you introduce food allergens early?

A. There is emerging evidence that early food introduction may have a role in preventing food allergy, particularly for egg and peanut, in high-risk infants.

BOTTOM LINE: Still introduce solids at around the 6 month mark following signs of readiness. If there is family history of food allergies the child would benefit from introducing those food allergens at the time that they start solids.

Q. When can you give babies plant-based milk like rice milk, almond milk, soy milk?

A. It is recommended to wait until little ones are at least 2 years old to give them plant-based milk (use formula or breastmilk until 1 year old; then use whole milk until 2 years of age). This is because growing babies need the higher fat and protein content that comes from breastmilk, formula or whole milk.

Recipes:

<https://www.kidswithfoodallergies.org/page/recipes-diet.aspx>

<https://celiac.org/eat-gluten-free/recipes/>

and Google!

References:

https://www.epipen.ca/sites/default/files/pdf/en/Holiday_Newsletter-Eng.pdf

<https://foodallergycanada.ca/about-allergies/related-conditions/intolerances/>

<http://www.unlockfood.ca/en/Articles/Food-allergies-intolerances/Food-allergies---Intolerances.aspx>

<https://foodallergycanada.ca/about-allergies/food-allergens/wheat/>

<https://foodallergycanada.ca/about-allergies/food-allergens/milk/>

<http://www.unlockfood.ca/en/Articles/Allergies-and-Intolerances/Managing-Lactose-Intolerance.aspx>

<http://csaci.ca/flip/en/mobile/index.html#p=6>

<http://www.unlockfood.ca/en/Articles/Food-allergies-intolerances/Peanut-free-Lunches-and-Snacks.aspx>

<https://www.kidswithfoodallergies.org/page/recipe-substitutions.aspx>

<https://foodallergycanada.ca/2018/03/ask-expert-great-substitutes-priority-allergens-canada/>

https://foodallergycanada.ca/wp-content/uploads/Food-allergen-substitution-chart_Linda-Kirste-RD.pdf

RECIPES



Chickpea pancakes/omelets

1 cup chickpea flour + 1 cup water= ~5 pancakes/omelets

Feel free to change up the veggies here! Use an assortment of diced zucchini, mushrooms, peas, green bell peppers, finely chopped broccoli or carrots. Fresh herbs would be great too!

Spices:

- ½ tsp salt
- ½ tsp pepper
- ½ tsp onion powder
- ½ tsp garlic powder

Optional spices:

- 1 tsp Mexican seasoning, optional
- ½ tsp red chili flakes, optional
- 1 tsp baking powder, optional (*this makes them fluffy like pancakes vs thin like crepes)

Choose veggies:

- Spring onions, finely diced
- Red pepper, finely diced
- Corn (frozen, fresh, or canned)
- Jalapeno, finely diced
- Onion or medium shallot, finely diced
- Handful of baby kale or spinach, roughly chopped
- Chives, to garnish
- Sautéed mushrooms

*can sprinkle cheese on top of pancake near the end of cooking

Instructions

1. Whisk the chickpea flour and water. Let it sit. Dice the veggies finely and add them to the mixture.
2. Ensure the bottom of the pan is coated well in oil.
3. Add about a ladle of the mixture and veggies when the pan is hot - a medium heat should be just right.
4. Cook for about 3 minutes - the mixture will quickly start to firm. Make sure you use a large pan (or pans) here, you're aiming for thin pancakes. They're MUCH easier to handle!
5. Use a large spatula to help you flip the pancakes, adding more oil underneath if necessary. After another 2-3 minutes your pancake will be ready!
6. Keep it somewhere warm while you repeat with the second pancake, adding more oil when necessary.
7. Done! Add your desired toppings and enjoy. Remember - it's important to eat these pancakes warm - don't let them get cold!

Serving suggestions:

Any chutneys, yogurt dip, hummus, avocado, guacamole, Siracha

Adapted from:

<https://hurrythefoodup.com/chickpea-flour-pancakes/>

<https://www.forksoverknives.com/recipes/chickpea-omelet/#gs.0ld5y3>

Chickpea Frittatas

2 cups water + 2 cups chickpea flour = ~12 muffin sized frittatas

Instructions

1. Preheat oven to 375 degrees F.
2. Whisk the chickpea flour (2 cups) and water (2 cups). Let it sit. Dice the veggies finely and add them to the mixture.
3. Scoop: Using a 1/4 measuring cup, scoop the batter into the muffin tin, filling all 12 holes.
4. Sprinkle with grated cheese if you'd like (optional).
5. Bake: Place in the oven, on the center rack, and bake for 35-40 minutes. Do the toothpick test, by sticking it in the center of a muffin, if it comes clean, frittatas are ready.
6. Remove from oven, let cool 5 minutes. Carefully turn out frittatas and place on cooling rack.
7. Enjoy warm.
8. Leftovers can be stored, covered, in the refrigerator or on the counter. Reheat in a toaster oven or microwave.

NOTES:

If not using a non-stick muffin tin, lightly grease each muffin hole. If using non-stick, the frittatas will fall out when turned over. You may need to gently tap the tin, upside down, on a hard surface to release them.

<https://simple-veganista.com/mini-chickpea-flour-frittatas/>

Buckwheat and Beet Salad

Serves 6-8

2 cups diced peeled cooked beets (~3-4 large beets)
2 cups vegetable or chicken stock
2 cloves garlic, minced
1 cup kasha or buckwheat groats
6 stalks celery, diced
6 green onions, thinly sliced
½ cup finely chopped parsley
6 oz feta cheese, crumbled

For the Dressing

¼ cup red wine vinegar
1 tsp. Dijon mustard
½ tsp. salt
½ tsp. freshly ground black pepper
3 Tbsp extra virgin olive oil

Instructions

1. Peel the beets and chop into small cubes; drizzle with oil and roast for ~45 minutes (until fork tender), flipping halfway.
2. In a saucepan over medium-high heat, bring stock and garlic to a boil. Gradually add kasha, stirring constantly to prevent clumping. Reduce heat to low. Cover and simmer until all the liquid is absorbed and kasha is tender, about 10 minutes. Remove from heat. Fluff up with a fork and transfer to a serving bowl and let cool slightly.
3. Make the dressing: In a small bowl, combine vinegar, mustard, salt and pepper, stirring until salt dissolves. Gradually whisk in olive oil until blended. Add to kasha and toss well.
4. Add beets, celery and green onions to kasha and toss again. Chill until ready to serve. Just before serving, garnish with parsley and sprinkle feta over top.

<https://wholegrainscouncil.org/recipes/kasha-and-beet-salad-celery-and-feta>

Sticky Chicken Zucchini Noodle Bowls

Serves 4-6

If you don't have a spiralizer, you can make this dish by julienning or using a vegetable peeler instead.

1 sweet (Vidalia) onion, chopped

1 Tbsp oil

2 Tbsp Tamari or soy sauce

1 Tbsp fish sauce

1 Tbsp almond butter

1 Tbsp rice wine vinegar

1 Tbsp honey

1 yellow squash, spiralized and drained*

1 zucchini, spiralized and drained*

*After spiralizing zucchini, lightly salt. Use a paper towel to press "noodles" in a colander lined with paper towels to release most of their juices, and allow to drain for 10 minutes.

CHICKEN AND MARINADE

4-6 boneless, skinless chicken thighs

3 Tbsp olive oil

3 Tbsp fresh orange juice

1 tsp minced garlic

1 Tbsp honey

½ tsp sea salt

½ tsp cracked black pepper

Instructions

1. Place a cookie sheet in oven and preheat oven to 400° F.
2. Mix together chicken marinade and drizzle over thighs.
3. Once oven has preheated, quickly remove pan and place thighs, skin side down, onto pan and return to oven for 15 minutes.
4. Remove pan from oven; flip thighs and cook an additional 15 to 20 minutes, or until golden brown and crispy.
5. Let rest for 5 minutes before slicing thinly.
6. Meanwhile, heat a large skillet over medium to medium-high heat.
7. Sauté onion in oil until it starts to soften, 3 to 4 minutes.
8. Whisk in tamari/soy sauce, fish sauce, almond butter, vinegar, honey and tamarind paste, if using, just until combined.
9. Add zucchini and toss to combine; let cook for 1 minute and remove from heat.
10. Serve "noodles" in individual bowls with chicken on top.
11. If desired, top with a squeeze of fresh lime juice.

<https://www.glutenfreeliving.com/recipes/main-dish/chicken-zucchini-noodle-bowls/>

Granola squares

Nut free and gluten free – Delicious, nutritious and oh so portable!

1 ¼ cup rolled oats, roasted
1 cup pumpkin seeds, roasted
1/4 cup chia seeds or ground flax seeds
1/2 cup (Packed) dried pitted prunes
1/2 cup (Packed) dried pitted dates
1/4 cup maple syrup
1/4 cup sunflower seed butter
1 Tbsp vanilla extract
1/4 cup coconut flakes

Instructions

1. Place fruit, syrup, seed butter and vanilla in a food processor. Blend until it is a thick puree.
2. Place oat flakes and seeds in a large bowl. Add puree. Knead granola by hand until thoroughly mixed.
3. Press into a pan. Sprinkle with coconut flakes and refrigerate for about ½ hour before serving.
4. Finally, cut into small squares.

<https://foodallergyCanada.ca/ask-expert-nutrition-food-allergies-back-school-art-science-healthy-eating/>