

Vegetable of the Month

RHIZOMES: GINGERROOT, GALANGAL, TURMERIC



Spice up your Food!

Rhizomes are knobby underground stems that are known for their pungent and flavorful flesh. The rhizome family includes ginger, turmeric and galangal among a few other, lesser known rhizomes. Rhizomes are not a significant source of any nutrients - most especially because they are rarely eaten in great enough quantities to constitute a serving. Ginger is a tropical Asian herb that is known for its spicy aromatic roots. In ancient India, ginger was believed to spiritually cleanse the body.

Nutrition Facts

Serving Size (48g)
Servings Per Container

Amount Per Serving

Calories 40 **Calories from Fat** 5

% Daily Value*

Total Fat 0g **0%**

Saturated Fat 0g **0%**

Cholesterol 0mg **0%**

Sodium 5mg **0%**

Total Carbohydrate 9g **3%**

Dietary Fiber 1g **4%**

Sugars 1g

Protein 1g

Vitamin A 0% • Vitamin C 4%

Calcium 0% • Iron 2%

*Percent Daily Values are based on a 2,000 calorie diet. Your daily values may be higher or lower depending on your calorie needs:

| | | Calories | 2,000 | 2,500 |
|--------------------|-----------|----------|---------|-------|
| Total Fat | Less Than | 65g | 80g | |
| Saturated Fat | Less Than | 20g | 25g | |
| Cholesterol | Less Than | 300mg | 300mg | |
| Sodium | Less Than | 2,400mg | 2,400mg | |
| Total Carbohydrate | | 300g | 375g | |
| Dietary Fiber | | 25g | 30g | |

Calories per gram:
Fat 9 • Carbohydrate 4 • Protein 4

Gingerroot

It was also used in ancient times as a food preservative and to help treat digestive problems. To treat digestive problems, Greeks would eat ginger wrapped in bread. Eventually ginger was added to the bread dough creating that wonderful treat many around the globe love today: gingerbread!

Ginger ale eventually stemmed from a ginger beer made by the English and Colonial America as a remedy for diarrhea, nausea and vomiting.

Ginger thrives in the tropics and warmer regions and is therefore currently grown in parts of West Africa, the West Indies, India and China with the best quality ginger coming from Jamaica where it is most abundant. In the United States, ginger is grown in Florida, Hawaii, and along the eastern coast of Texas.



Gingerroot is characterized by its strong sweet, yet woody smell. It is tan in color with white to creamy-yellow flesh that can be coarse yet stringy.

| Nutrition Facts | |
|--|------------------------------|
| Serving Size (64g) | |
| Servings Per Container | |
| Amount Per Serving | |
| Calories 45 | Calories from Fat 5 |
| % Daily Value* | |
| Total Fat 0g | 0% |
| Saturated Fat 0g | 0% |
| Cholesterol 0mg | 0% |
| Sodium 10mg | 0% |
| Total Carbohydrate 10g | 3% |
| Dietary Fiber 2g | 8% |
| Sugars 0g | |
| Protein 1g | |
| Vitamin A 0% • Vitamin C 6% | |
| Calcium 0% • Iron 2% | |
| *Percent Daily Values are based on a 2,000 calorie diet. Your daily values may be higher or lower depending on your calorie needs: | |
| | Calories 2,000 2,500 |
| Total Fat | Less Than 65g 80g |
| Saturated Fat | Less Than 20g 25g |
| Cholesterol | Less Than 300mg 300 mg |
| Sodium | Less Than 2,400mg 2,400mg |
| Total Carbohydrate | 300g 375g |
| Dietary Fiber | 25g 30g |
| Calories per gram: | |
| Fat 9 • Carbohydrate 4 • Protein 4 | |

Galangal

Galangal (guh-LANG-gul) comes from the plant *Alpinia galanga* (or *Languas galangal*) and has many common names including greater galangal, galangale, and galang.

The rhizome (root) of galangal resembles ginger in taste and appearance. It is predominantly found in Asian markets and sold fresh, frozen, dried, or powdered. Galangal is also well known in European medieval cooking. Only a pinch of dried and powdered versions are typically needed.

Galangal is frequently used in fish and shellfish recipes in combination with garlic, ginger, chilli, and lemon.

Galangal Varieties

Greater Galangal: Orange-brown skin with pale yellow or white interior. Greater galangal can be found in sliced form or powder. Used as a flavoring throughout Indonesia, Malaysia, and parts of India.
Flavor: Not as pungent as lesser galangal.



Lesser Galangal: This rhizome has a red-brown interior and fibrous texture. It can be founded as slices or powder. Lesser galangal comes from China where it is used as a medicinal herb, but it is now grown in Indonesia and regarded as a spice.

Flavor: Aromatic and pungent, peppery and ginger-like. Stronger, more medicinal taste than greater galangal.

Kaempferia Galangal: Often identified as greater galangal. Red skin and white interior. Used as a flavoring in South East Asia.

Flavor: Medium in strength.

Different galangal varieties vary in their hotness and flavor. Flavor ranges from flowery to ginger-like to peppery cinnamon (see box below).

In addition to being used as a spice in cooking, galangal has been used in Asia and the Middle East in perfumes, snuffs, aphrodisiacs, and as flavors for condiments (including vinegar and beer), in teas in Germany and wines in Russia. Like ginger, galangal has been used for medicinal purposes to treat nausea, flatulence, and dyspepsia.



Tumeric

Tumeric is the root of a tropical plant that has been used in cooking since 600 B.C. It is native to the Orient and now can be found in India and the Caribbean. It has a bitter, pungent almost woody flavor, is yellowish-orange in color.

The tumeric root has light brown skin and bright reddish-orange flesh. Turmeric was used in biblical times as a perfume but now it is most commonly used to flavor and color food. Ground turmeric is widely used in East Indian cooking particularly in curries as well as other soups and stews.

Rhizomes: Availability, Selection, and Storage

Rhizomes can be found as roots in some Asian grocery stores, farmers markets and natural food stores (gingerroot can even be found in many chain grocery stores). In spice form, ginger and tumeric can be found in almost any food store.

Galangal

When ripe, galangal should be ivory white and firm with very little separation between skin and flesh. Never buy galangal that is wrinkled or shriveled. Store refrigerated uncut and unwrapped for up to 3 weeks or, peel the root and place it in a jar of sherry and store it refrigerated for several months. Galangal can be frozen if tightly wrapped in foil.

Ginger

Ginger is available year-round. When selecting gingerroot, choose robust firm roots with a spicy fragrance and smooth skin. Gingerroot should not be cracked or withered. It can be stored tightly wrapped in a paper towel or plastic wrap (or put into a plastic bag) in the refrigerator for 2-3 weeks and like galangal, gingerroot can also be placed in a jar of sherry and refrigerated for 3-6 months.

Tumeric

Fresh tumeric roots should have a spicy fragrance and stubby fingers protruding from the sides of the root. Refrigerate unpeeled tumeric, tightly wrapped, for 3 weeks.

Preparation

Galangal

Galangal can be sliced and used to flavor soups and stews (remove before serving). It can also be mixed with lemon grass, chilies, shallots and garlic into a paste that can be used to flavor rice dishes. Galangal can also be mixed into a curry paste for similar purposes.

Ginger

Peel skin from the root and gently peel the skin beneath (that closest to the root is the most flavorful). Gingerroot can be sliced or minced (minced gingerroot gives the most pungent flavor). Ginger is popular in Asian cuisine where it is used both fresh and dried. Ginger can also be found crystallized, candied, preserved and pickled.

The powdered, dried form of ginger has a more spicy, intense flavor and is often used in baking (gingerbread, gingersnaps, ginger cookies).

Tumeric

Tumeric is typically boiled or steamed and then dried and ground into powder. Use ground tumeric in fish or rice dishes. Be careful with fresh turmeric, it will stain your hands and clothing.

Saffron (very expensive) is sometimes substituted for tumeric.



Include Rhizomes to spice your 5 to 9 A Day Plan!

- Ginger can be used raw or cooked; use sparingly at first to become acquainted with the pungent taste.
- Chop ginger finely and sauté with garlic as a flavor base for oriental stir-fries.
- Add powdered tumeric to rice dishes for coloring and flavor.
- Soups and stews can be flavored with tumeric.

Recipes

Ginger Smashed Potatoes with Dill

Makes 8 servings

Each serving equals two 5 A Day servings

Source: Wegmans



Ingredients

8 red potatoes (unpeeled), washed and quartered

1 bag (16 oz) stew style vegetables

1 Tbsp salt

1 tsp fresh grated ginger

1 cup light cream

2 Tbsp unsalted butter

1 Tbsp fresh chopped dill

Place potatoes and vegetables in soup pot, cover with cold water; add salt. Bring to boil, covered, on HIGH heat; reduce to simmer.

Simmer until potatoes are tender, 25-30 min. Drain; return potato mixture to pot. Add ginger, cream and butter.

Smash potato mixture with potato masher or beat with handheld mixer to desired consistency. Add dill; season with salt and pepper to taste.

Nutritional analysis per serving: Calories 271, Protein 5g, Fat 9g, Calories From Fat 29%, Cholesterol 27mg, Carbohydrates 42g, Fiber 3g, Sodium 349mg.

Gingered Beef with Broccoli and Stir-Fry Sauce

Makes 4 servings

Each serving is equal to one and one-half 5 A Day servings

Source: Wegmans



Ingredients

2 cups broccoli crowns (separate florets and slice stems $\frac{1}{4}$ -inch)

$\frac{3}{4}$ lb lean beef cut for stir fry

3 Tbsp water

$1\frac{1}{2}$ Tbsp cornstarch

2 Tbsp vegetable oil

1 Tbsp unpeeled fresh ginger, minced

$\frac{3}{4}$ cup low sodium stir-fry sauce

1 red pepper, cut in 1-inch pieces

$\frac{1}{2}$ cup shiitake mushrooms, stemmed

$\frac{1}{2}$ cup snow peas, trimmed

Rinse broccoli. Microwave, covered on HIGH for 3 minutes; drain. Place beef in a small bowl. Pour in water, 1 Tbsp at a time, working in with hands until water is absorbed into beef. Sprinkle cornstarch over beef and work in with hands to coat all pieces.

Heat nonstick wok or skillet on HIGH. When hot, pour 1 Tbsp oil down sides of pan. Add ginger and beef; stir-fry just until beef browns.

Add sauce and toss to coat; remove beef from pan. Add remaining oil. Add broccoli to pan along with peppers, mushrooms and snow peas. Stir-fry 2 min. Return beef with sauce to pan; toss to heat through, about 30 seconds.

Serve with steamed rice.

Nutritional analysis per serving: Calories 330, Protein 26g, Fat 11g, Calories From Fat 30%, Cholesterol 48mg, Carbohydrates 30g, Fiber 6g, Sodium 444mg.

Basmati Rice with Galangal and Broccoli

Makes 4 servings

Each serving equals one 5 A Day servings

Ingredients

enough basmati rice to make 2 cups cooked

2 cups steamed broccoli

4 pieces galangal; peeled

$\frac{1}{2}$ tsp salt

grated zest and juice of 1 lime

2 tsp sugar

2 tsp rice vinegar

2 tsp chopped coriander

salt and freshly ground black pepper



Place the rice in a pan, cover the rice with water and bring to the boil. Add 3 pieces of roughly chopped galangal and the salt to the rice. Cook the rice according to the package instructions.

Remove the galangal, place the rice into a clean bowl and add the remaining ingredients and add seasoning to taste. Grate the remaining pieces of galangal and squeeze the juice over the rice.

Nutritional analysis per serving: Calories 193, Protein 6g, Fat 2g, Calories From Fat 1%, Cholesterol 0mg, Carbohydrates 41g, Fiber 5g, Sodium 317mg.

Vegetable Curry

Makes 8 servings

Each serving equals one and one-half Five A Day servings

Ingredients

2 lbs mixed vegetables (french beans, carrots, peas, potatoes & cauliflower)

2 onions, chopped

10 mild red chilies

10 tsp. poppy seeds

7 cloves garlic

$\frac{1}{2}$ tsp turmeric

1" piece fresh root ginger, grated

3 tsp. melted butter

$\frac{1}{2}$ tsp curry powder

7 oz plain yogurt

3 Tbsp whipped cream

1 tsp sugar

salt to taste

Prepare and cook the mixed vegetables till crunchy, breaking or cutting large ones into bite-sized pieces. Vegetables can also be microwaved.

Grind the onions, chilies, poppy seeds, garlic, turmeric and ginger into a paste.

Melt butter in a heavy based saucepan. Add the paste and cook for 3 to 4 minutes. Stir in the curry powder and cook for a few minutes more. Then add the vegetables and water and bring to the boil and simmer for a few minutes.

Stir in the yogurt, cream, sugar and salt, heat gently then serve hot with pita bread.

Nutritional analysis per serving: Calories 145, Protein 6g, Fat 4g, Calories From Fat 24%, Cholesterol 9mg, Carbohydrates 22g, Fiber 5g, Sodium 182mg.

Spiced Cabbage

Makes 4 servings

Each serving equals one 5 A Day serving

Ingredients

half a medium cabbage

1 small onion (or half a medium one)

1 hot green chili pepper

1 Tbsp coconut

$\frac{1}{2}$ tsp. turmeric powder

2 cm piece of fresh root ginger

spray oil

Shred the cabbage very finely and chop into small pieces. Finely chop the onion, chilli and ginger. Spray frying pan with spray oil. Add the onion, ginger and chilli. Cook for 30 seconds then add the cabbage and turmeric. Cook at a high temperature for about ten minutes stirring all the time. Remove the pan from the heat and stir in the coconut. This dish can be served on it's own but can also accompany many different rice dishes.

Nutritional analysis per serving: Calories 58, Protein 2g, Fat 1g, Calories From Fat 22%, Cholesterol 0mg, Carbohydrates 11g, Fiber 4g, Sodium 36mg.