Spices

Spices are aromatic ingredients added in small amounts to foods to give them a specific flavor. They are the seeds, bark, roots, stalks, or fruits of a wide range of plants. Many of the spices we take for granted today, such as cinnamon or pepper, were once so costly that only rich people could afford them.

Although not all spices can be purchased whole, you should try to purchase whole spices whenever you can. Whole spices last longer than spices that are already ground. Ground spices lose their aroma or fragrance more quickly. Whole peppercorns, for instance, can last for several years in dry storage, but ground black pepper starts to lose its flavor after about six months. You can always grind whole spices as you need them.

Spices are sometimes added to a dish whole and then strained out. In other dishes, spices are ground and then cooked in a little oil or other fat to distribute the flavor evenly through the dish. Often, spices are added directly to the dish as it cooks. Recipes usually indicate when and how to add spices to a dish. Spices are also used to flavor oils or vinegars, which are themselves used to flavor dishes.

CHEF'S TIP

CHECK FRESHNESS

Be sure to check spices before you use them. Rub them between your fingertips and then smell them. If the flavor is strong and pleasant, they are still fresh enough to use.

CULINARY H STORY

Spice Routes

Spices such as cloves, saffron, and cinnamon were highly prized. In the Middle Ages using spices was a show of wealth. But why were spices so valuable just a few hundred years ago? It all has to do with transportation and trade.

First, the Chinese established a trade route, known as the "Silk Road," that linked the East with the Middle East. Merchants would travel in caravans along a number of routes, carrying spices, silks, and gems.

Merchants along the way purchased goods and carried them further west. By the time a spice such as cinnamon had traveled from China or the Spice Islands to Europe, it had changed hands many times. Of course, the price went up each time.

The locations where the spices were grown were jealously guarded secrets. Outlandish stories were often told to Europeans to keep them from getting their hands on the spices. For example, Romans, anxious to find a less expensive source



Caravan on the Silk Road

for cinnamon, were told by Chinese merchants that the sweet spice had to be harvested from remote caves that were guarded by fierce bats.

Research

Research which spices were transported on the Silk Road in the Middle Ages. Provide a detailed description of (or the recipe for) a dish from the Middle Ages that would have used one or more of these spices.

Spices

Allspice

Small brown berries that are ground for use as a spice. Allspice lives up to its name. It has a flavor and aroma that is a mixture of cinnamon, clove, nutmeg, ginger, and pepper. Allspice is typically available



cracked or ground. Also known as Jamaican pepper, allspice is typically used in spicy, fragrant Jamaican jerked chicken.

Caraway Seeds

A member of the parsley family, the caraway plant is actually an herb. However. the plant is best known as the source for caraway seeds. These small crescent-shaped seeds have a nutty,



peppery, licorice taste. They are widely used in baked goods and savory dishes.

Cardamom >

These long, light green or brown pods contain a seed that has a pungent, musty, lemony flavor. Cardamom (CARD-uh-mom) is available in whole pods or ground. It is used widely used in Indian dishes.



Cinnamon |

Cinnamon is the inner bark of a small evergreen tree that originally came from India and other eastern countries. It has a sweet flavor and aroma. It is sold ground or in rolledup sticks. It is used



in a number of desserts. It is also an important flavoring in many savory dishes.

Cloves >

Cloves (CLOVS) are the unopened bud of a tropical evergreen tree. Individual cloves are brown and are shaped like nails (which is why the Romans gave them the name "clavus," the Latin word for



nail). Cloves are extremely aromatic, with a sweet, astringent flavor. Like cinnamon, cloves are considered a sweet spice. Cloves are sold whole or ground.

Cumin >

Cumin (COO-min) is the crescentshaped seed of a plant in the parsley family. It has a strong, distinctive earthy flavor and aroma that is often associated with Mexican cooking. Cumin is available



whole or ground and is also used in Middle Eastern and Indian dishes.

Fennel

With its feathery foliage, fennel looks like dill. It has a pronounced licorice flavor and is used fresh or dried. The oval seeds are used in Italian and Central European cuisines for baked goods and savory



dishes. Fennel seeds are usually sold as whole seeds.

Mustard >

Mustard is a member of the cabbage family, and its leaves are eaten as a vegetable. However, its seeds have an earthy hot flavor and a pungent smell. There are yellow, red, and black



varieties of mustard seeds. Each has a distinctive taste. Mustard is sold as whole seeds or as a powder. The whole seeds are used in Indian cuisine.





Ginger

Ginger is a tall tropical plant, but only the gnarled root is used as a spice. Ginger root must be peeled to be used. Fresh ginger has a distinctive peppery, sweet flavor with hints of lemon and rosemary and a strong, spicy aroma. Powdered or ground ginger is made by drying fresh ginger root and then pulverizing it. Ginger is used in Asian and Indian cuisines for both sweet and savory dishes.

Nutmeg and Mace >

The seed of the nutmeg tree, nutmeg is oval and has a smooth texture. Mace is the lacy coating that surrounds the seed. Both have a sweet flavor and are highly fragrant.



Nutmeg tastes best when it is freshly ground, using a special grater. Both nutmeg and mace are available ground as well. They are used in both sweet and savory dishes.

Peppercorns

Peppercorns are the berry of the pepper vine, which originally came from India and Indonesia. Small amounts are used as seasoning, along with salt. Larger amounts can be used to flavor a dish. Besides black and white peppercorns, which were discussed in the previous section of this book, there are also green and pink peppercorns. Green peppercorns are unripened peppercorns that are pickled or freeze-dried. They have a soft texture and a sour taste. Pink peppercorns, which are available dried or pickled, are actually not peppercorns. They are the dried berries of a South American rose, and have a bitter, piney flavor.

Spices



Peppers

Native to the Americas, peppers are vegetables. They have a wide range of colors and flavors ranging from sweet to extremely hot. Hot peppers are often referred to as chile peppers or chiles. Both sweet and hot peppers are dried and then ground to create a variety of sweet or hot spices. Paprika, for example, is a blend of dried red chiles with a flavor that can range from sweet to hot. Ground peppers are used as a spice in Central Europe, Spain, Italy, and the Americas.

Saffron >



Saffron not only



flavors foods, it also gives them a deep yellow color. Saffron threads are usually crushed before they are added to a dish. Powdered saffron is also available.

Curry powder, chili powder, and pumpkin pie spice are all examples of spice blends, made by combining a variety of spices (and often herbs as well). Dry rubs for seasoning meats or poultry before they

FIGURE 6-6 **Curry Powder** Curry powder is a blend of up to twenty herbs and spices. **Drawing Conclusions** What do you achieve when you combine many herbs and spices (including cinnamon, chiles, fennel seeds, ginger, and cumin) into a spice blend such as curry powder?



roast are another type of spice blend. Many spice blends are prepared and packaged for sale. Some chefs prefer to make their own spice blends so they can control the amount and type of spices in the blend. Spice blends are typically ground for an even texture, but some include whole spices and seeds.



What are spices? Give five examples of spices.

Additional Aromatic Ingredients

Herbs and spices usually have strong and distinctive aromas. However, chefs sometimes use additional aromatic ingredients to add more flavor and aromas to a dish. The three basic types of additional aromatic ingredients used in cooking are:

- Aromatic vegetables and fruits
- Aromatic liquids
- Cured and smoked foods

Aromatic Vegetables and Fruits You can add aromatic vegetables to a dish for some additional flavor and aroma. Plants in the onion family, including garlic, green onions, and leeks, are the most common aromatic vegetables. Other vegetables prized for their aromas include mushrooms and celery. Tomatoes can be used for their aroma. They may be simply chopped and added to the dish or, to intensify their flavor, they can be cooked in the oven or in a pan over direct heat.

Fruits—especially citrus fruits such as lemons, limes, and oranges—are often used to add flavor and aroma to a dish. You can add just the zest (the outer peel) or the juice. You can also use dried fruits such as raisins or apricots to add flavor and aroma to a dish.

Aromatic Liquids Chefs use a variety of liquids in cooking everything from soup to vegetables to grains. Broths and stocks (concentrated broth-like liquids) add aroma to a dish. Other aromatic liquids a chef might use are wines, brandies, and liqueurs. Usually, these are heated to evaporate the alcohol and concentrate the taste.

Flavorful oils, including flavored olive oil, sesame oil, and walnut oil, can also be added to a dish to increase flavor and aroma. These oils are usually not allowed to cook for long in a dish. Getting them too hot for too long cooks away their delicate aroma.

Extracts are made by soaking aromatic ingredients such as vanilla or lemon in alcohol. Extracts can also be added in small amounts to a dish to increase flavor and aroma.



Cured Foods Cured foods are foods that are preserved by drying, salting, pickling, or smoking (such as ham, bacon, or salted anchovies). They add a savory flavor and aroma to a dish, and they may also add saltiness. Cured foods are strongly flavored. They are usually added when you begin cooking a dish so they can flavor the dish evenly.



What are the three types of additional aromatic ingredients commonly used in cooking?

Aromatic Combinations

Any time you use more than one flavoring or aromatic ingredient in a dish, you've made an aromatic combination. Some specific combinations are used frequently in the kitchen. The three most common are

- Mirepoix
- Sachet d'épices
- Bouquet garni

Mirepoix Mirepoix (MEER-pwah) is a combination of vegetables used as an aromatic flavoring ingredient in many dishes. You can cut the vegetables in mirepoix into large or small pieces. To determine how big the pieces should be, read over the recipe to find out how long the mirepoix will cook in the dish. Long-cooking dishes call for large pieces of mirepoix. Dishes that cook quickly need mirepoix that is cut into small pieces or thin slices.

By making a few changes to the ingredients in a mirepoix, you can produce a variety of aromatic combinations. The most common types of mirepoix or mirepoix-like aromatic combinations are:

- Standard Mirepoix. Used for a variety of stocks and soups, a standard mirepoix typically includes the following ingredients (by weight): 2 parts onion, 1 part carrot, and 1 part celery. For brown stock, soup, gravy, or stews, a tomato paste or tomato purée is often included in the mirepoix.
- White Mirepoix. A white mirepoix is used to flavor white stocks and soups that should have a pale ivory or white color. Parsnips replace the carrots. Leeks may replace some of the onions.
- Cajun Trinity. Used in many Creole (KREE-ol) and Cajun (CAGE-uhn) dishes such as gumbo, a Cajun trinity is a combination of onion, celery, and green pepper.
- Matignon. This mirepoix-like aromatic combination contains onions, carrots, celery, and ham. Matignon (mah-tee-YOHN)

FIGURE 6-7 **Pork and Beans** Smoked ham and a bouquet garni are added to beans. Predicting How will the ham change the flavor of the beans?

BASIC CULINARY SKILLS

Mirepoix

- Rinse onions, carrots, and celery.
- Trim all ingredients.
- Cut ingredients to the correct size.
- 4 Add mirepoix at the correct time. (Consult your recipe.)
- Cook long enough to flavor the dish.





Standard mirepoix ingredients: onion, carrot, and celery

is not strained from the dish, so it is important to peel all vegetables and cut all ingredients into a neat dice. Mushrooms, herbs, and spices may also be required by your recipe. Matignon is sometimes known as "edible mirepoix."

Battuto. Used in Italian soups, sauces, stews, and meat dishes, battuto (bah-TOOT-oh) includes a cooking fat (olive oil, chopped lard, pancetta, or fatback) with garlic, onions, parsley, carrots, and celery. Green peppers are also commonly added.

Sachet d'Epices and Bouquet Garni Sachet d'épices and bouquet garni are two classic aromatic combinations used in many dishes.

• Sachet d'Epices. A sachet d'épices (SAH-shay DAY-pees) is a mixture of fresh and dried herbs and dried spices that is tied up in a piece of cheesecloth to make a small bag. Sachet d'épices means "bag of spices" in French. A standard sachet d'épices includes peppercorns, dried thyme leaves, and fresh parsley stems.

Bouquet Garni. Another combination of aromatics, a bouquet garni (boo-KAY GAR-nee) uses fresh herbs rather than dried herbs. It also usually includes an aromatic vegetable such as leeks, garlic, or scallions. The ingredients in a bouquet garni may also include sprigs of fresh thyme, fresh parsley stems, rosemary, and citrus peels. Leek leaves or a citrus peel may be used as a wrapper instead of cheesecloth. The ingredients are then tied up.

Reading Checkpoint

What are the three most common types of aromatic combinations?



BASIC CULINARY SKILLS

Sachet d'Epices

- Measure peppercorns, thyme, and parsley.
- Wrap the sachet d'épices ingredients in a square of cheesecloth.



Tie the cheesecloth with string to make a bag.



- Add to the dish.
- Simmer until the dish is aromatic. (Consult your recipe.)
- 6 Remove and discard.



See Recipe Card 2, "Sachet d'Epices."

6.3 ASSESSMENT

Reviewing Concepts

- 1. What are herbs? Give five examples.
- 2. What are spices? Give five examples.
- **3.** Aside from herbs and spices, what are the three additional types of aromatic ingredients commonly used in cooking?
- **4.** What are the three most common types of aromatic combinations?

Critical Thinking

- **5.** Comparing/Contrasting Using fennel as an example, describe when you would consider it an herb and when you would consider it a spice.
- **6.** Communicating Of the herbs and spices listed in this section, which is your favorite? Describe the flavor of your selection.
- **7.** Comparing/Contrasting How does a Cajun trinity differ from a standard mirepoix?

Test Kitchen

Divide into four teams. Each team will finely mince a different herb, either chives, oregano, tarragon, or rosemary. Mix the herb with 2 Tbsp of salted butter at room temperature. Spread on toast. Cut into enough squares for the class to sample. Rank the taste from most favorite to least favorite. Tally the results for the class.

SOCIAL TIMES

Myths about Herbs and Spices

Research a particular herb or spice. Write a description of any myths or legends related to the herb or spice you chose. Research how the herb or spice acquired its name and whether it has historically been associated with any medical or health benefits.