

## Six Basic Classes of Wheat



Wheat is the principal U.S. cereal grain for export and domestic consumption. In terms of value, wheat is the fourth leading U.S. field crop and our leading export crop.

Wheat has two distinct growing seasons. Winter wheat, which normally accounts for 70 to 80 percent of U.S. production, is sown in the fall and harvested in the spring or summer; spring wheat is planted in the spring and harvested in late summer or early fall.

There are several hundred varieties of wheat produced in the United States, all of which fall into one of six recognized classes. (This is in marked contrast to the one or, at most, two wheat classes produced in other nations.) Where each class of wheat is grown depends largely upon rainfall, temperature, soil conditions and tradition. Generally speaking, wheat is more often grown in arid regions where soil quality is poor.

Wheat classes are determined not only by the time of year they are planted and harvested, but also by their hardness, color and the shape of their kernels. Each class of wheat has its own similar family characteristics, especially as related to milling and baking or other food use.

### **HARD RED WINTER**

The dominant class in U.S. exports and the largest class produced each year. Produced in the Great Plains states, a large interior area extending from the Mississippi River west to the Rocky Mountains and from Canada to Mexico. Wide range of protein content, good milling and baking characteristics. Used to produce bread, rolls and, to a lesser extent, sweet goods and all-purpose flour. Major foreign buyers include Russia, China, Japan, Morocco and Poland.

### **HARD RED SPRING**

Contains the highest percentage of protein, making it an excellent bread wheat with superior milling and baking characteristics. Majority of crop is grown in Montana, North Dakota, South Dakota and Minnesota. Exported largely to Central America, Japan, the Philippines and Russia.

### **SOFT RED WINTER**

Grown primarily east of the Mississippi River. High yielding, but relatively low protein. Used for flat breads, cakes, pastries, and crackers. Largest customers are China, Egypt and Morocco.

### **DURUM**

The hardest of all U.S. wheat and consistently the class with the lowest export volume, accounting for less than 5 percent of all U.S. wheat exports. Grown in the same northern states as Hard Red Spring, although 70 to 80 percent of the U.S. annual production comes from North Dakota. Used to make semolina flour for pasta production. The largest importer is Algeria.

### **HARD WHITE WHEAT**

The newest class of wheat to be grown in the United States. Closely related to red wheats (except for color genes), this wheat has a milder, sweeter flavor, equal fiber and similar milling and baking properties. Used mainly in yeast breads, hard rolls, bulgur, tortillas and oriental noodles. Used primarily in domestic markets, although it is exported in limited quantities.

### **SOFT WHITE WHEAT**

Used in much the same way as Soft Red Winter (for bakery products other than bread). Grown mainly in the Pacific Northwest and to a lesser extent in California, Michigan, Wisconsin and New York. Low protein, but high yielding. Produces flour for baking cakes, crackers, cookies, pastries, quick breads, muffins and snack foods. Exported to Far East Asian region.

Source: The Wheat Grower/September-October 1994