

Health & Nutrition Sciences

Food Additives: A Quick Guide




What is a food additive?

Food additives are ingredients added to a food to improve nutritional value, food safety, taste, and/or texture.¹ Some of these ingredients, like salt, herbs and spices are easily recognizable, while others may look unfamiliar.

These ingredients are useful in food production to ensure that food remains fresh, safe, nutritious and convenient³ as it makes its way from the food manufacturer to the grocery store and finally to your kitchen. In the U.S, the Food and Drug Administration (FDA) keeps track of all these ingredients in a database and evaluates their safety. The FDA regulations may also indicate what types of foods certain ingredients can be used in, how much can be used, and how they must be labeled.²





Maintaining and improving nutritional value





| What you might see on the label ⁴ | What are they? ⁴ | What they do ⁴ | Where can they be found? ⁴ |
|---|-----------------------------|--|--|
| <ul style="list-style-type: none"> • Thiamin hydrochloride • Riboflavin • Niacin/Niacinamide • Folate/Folic acid • Beta carotene • Potassium iodide • Ferrous sulfate • Tocopherol • Ascorbic acid | Vitamins & minerals | Replace vitamins/minerals lost during processing (enrichment) or add nutrients lacking in the diet (fortification) | <p>Many foods including cereals, baking mixes, pasta, rice</p>  |
| <ul style="list-style-type: none"> • Sucralose • Aspartame • Acesulfame potassium • Saccharin • Stevia leaf extract • Monk fruit extract • Neotame • Thaumatin | Low calorie sweeteners | Provide sweetness with few or no additional calories, often used as sugar substitutes ⁵ | <p>Many foods including beverages, confectionary, desserts</p>  |
| <ul style="list-style-type: none"> • Psyllium husk • Cellulose • Guar gum • Pectin • Inulin • Locust bean gum | Dietary fibers | Increase fiber content (must be identified by FDA to provide a health benefit) ⁶ | <p>Fiber products</p>  |

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Maintaining and improving safety and freshness

| What you might see on the label ⁴ | What are they? ⁴ | What they do ⁴ | Where can they be found? ⁴ |
|---|-------------------------------|--|---|
| <ul style="list-style-type: none"> Sodium benzoate Sodium nitrite Propionic acid Sorbic acid Potassium sulfite | Preservatives (antimicrobial) | Extend storage and shelf-life by stopping or slowing growth of fungi, bacteria or microorganisms | Many foods including cured meats and beverages  |
| <ul style="list-style-type: none"> BHA BHT Propyl gallate Tocopherol Ascorbic acid | Preservatives (antioxidant) | Prevent changes in color, flavor, texture, and delays production of undesirable odors | Many foods including cereals, baked goods, beverages  |

Improving taste, texture, or appearance

| What you might see on the label ⁴ | What are they? ⁴ | What they do ⁴ | Where can they be found? ⁴ |
|--|--|---|---|
| <ul style="list-style-type: none"> Sodium bicarbonate Monocalcium phosphate Sodium aluminum phosphate Calcium carbonate | Leavening agents | Promote rising in baked goods | Pancake and baking mixes  |
| <ul style="list-style-type: none"> Silicon dioxide Calcium silicate Aluminum silicate | Anti-caking agents | Prevent clumping, especially in powder or granule form | Drink mixes  |
| <ul style="list-style-type: none"> Gelatin Lecithin Casein Mono-and diglycerides Polysorbate Sorbitan monostearate | Emulsifiers | Stabilize mixtures of oil and water, prevent separation | Protein shakes, sauces, chocolate  |
| <ul style="list-style-type: none"> Agar Pectin Gum arabic Gelatin Whey Xanthan gum | Stabilizers, thickeners, binders & texturizers | Provide uniform texture and improve mouth-feel | Pudding mixes, sauces, frozen desserts  |

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