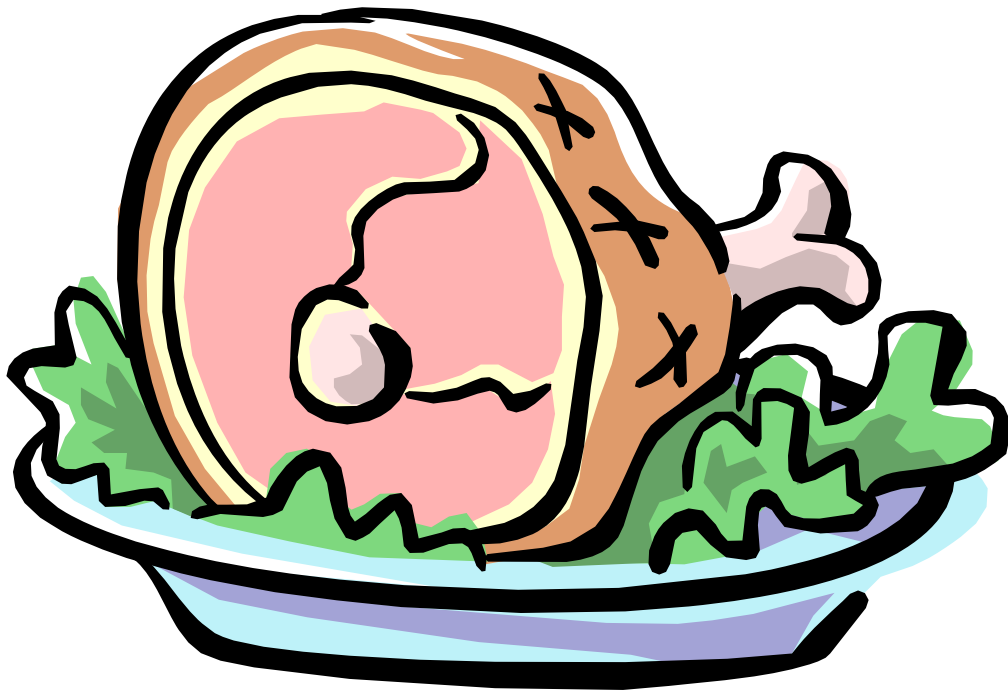


# *Handling Ham*



Made Available By:  
Mandy Armentor, MS, RD, LDN  
Assoc. Extension Agent (FCS-Nutrition)  
Vermilion Parish  
337-898-4335

# Ham

*Hams: They can be fresh, cook-before-eating, fully-cooked, picnic and country types. There are so many kinds, and their storage times and cooking times can be quite confusing. This background information serves to carve up the facts and make them easier to understand.*

## Definition

The word HAM means pork which comes from the hind leg of a hog. Ham made from the front leg of a hog will be labeled "pork shoulder picnic." "Turkey" Ham must be made from the thigh meat of turkey. Hams may be fresh, cured, or cured-and-smoked. The usual color for cured ham is deep rose or pink; fresh ham (which is not cured) has the pale pink or beige color of a fresh pork roast; country hams and prosciutto (which are dry cured) range from pink to mahogany color.

Hams are either ready-to-eat or not. Ready-to-eat hams include prosciutto and fully cooked hams; they can be eaten right out of the package. Fresh hams and hams that are only trichina treated must be cooked by the consumer before eating; these hams will bear the safe handling label.

## Curing Solutions

Curing is the addition of salt, sodium nitrate (or saltpeter), nitrites and sometimes sugars, seasonings, phosphates and ascorbates to pork for preservation, color development and flavor enhancement.

Nitrate and nitrites contribute to the characteristic cured flavor and reddish-pink color of cured pork. Nitrite and salt inhibit the outgrowth of *Clostridium botulinum*, a deadly microorganism which can occur in foods.

The two most-used methods of adding solutions to pork are: injection into muscle by needle; and tumbling or massaging into muscle to produce a more tender product.

## Dry Curing

In dry curing, the process used to make country hams and prosciutto, fresh meat is rubbed with a dry-cure mixture of salt and other ingredients. Dry curing produces a salty product. In 1992, FSIS approved a trichina treatment method that permits substituting up to half of the sodium chloride with potassium chloride to result in lower sodium levels. Since dry curing draws out moisture, it reduces ham weight by at least 18% -- usually 20 to 25%; this results in a more concentrated ham flavor.

Dry-cured hams may be aged from a few weeks to more than a year. Six months is the traditional process but may be shortened according to aging temperature.

These uncooked hams are safe stored at room temperature because they contain so little water, bacteria can't multiply in them. Country hams may not be injected with curing solutions or placed in curing solutions but they may be smoked.

## **Wet Curing or Brine Cure**

Brine curing is the most popular way of producing hams. It is a wet cure whereby fresh meat is injected with a curing solution before cooking. Brining ingredients can be salt, sugar, sodium nitrite, sodium nitrate, sodium erythorbate, sodium phosphate, potassium chloride, water and flavorings. Smoke flavoring (liquid smoke) may also be injected with brine solution. Cooking *may* occur during this process.

## **Smoking and Smoke Flavoring**

After curing, some hams are smoked. Smoking is a process by which ham is hung in a smokehouse and allowed to absorb smoke from smoldering fires. This gives added flavor and color to meat and slows the development of rancidity.

## **Quantity to Buy**

When buying a ham, estimate the size needed according to the number of servings the type of ham should yield:

- 1/4 - 1/3 lb. per serving of boneless ham
- 1/3 - 1/2 lb. of meat per serving of ham with little bone
- 3/4 - 1 lb. of meat per serving of ham with large bone.

## **Cooking or Reheating Hams**

Both vacuum-packaged fully cooked and canned hams can be eaten cold just as they come from their packaging. However, if you want to reheat these fully cooked hams, set the oven no lower than 325° F and heat to an internal temperature of 140° F as measured with a meat thermometer.

For fully cooked ham that has been repackaged in any other location outside the plant or for leftover fully cooked ham, heat to 165° F.

Cook-before-eating hams must reach 160° F to be safely cooked before serving. Cook in an oven set no lower than 325° F. Hams can also be safely cooked in a microwave oven, other countertop appliances and on the stove top. Consult a cookbook for specific methods and timing.

Country hams can be soaked 4 to 12 hours or longer in the refrigerator to reduce the salt content before cooking. Then they can be cooked by boiling or baking. Follow the manufacturer's cooking instructions.

## HAM GLOSSARY

**BUTT END, HALF OR PORTION** - the upper, meatier part of the whole leg; a butt portion has had some center slices removed for separate sale as ham steaks or center cut ham slices. The half includes this meat.

**CANNED HAM** -- Canned hams come in two forms:

- Shelf stable - store on shelf up to 2 years at room temperature. Generally not over 3 pounds in size. Processed to kill all spoilage bacteria and pathogenic organisms. The product is free of microorganisms capable of growing at ordinary room temperature.
- Refrigerated - may be stored in refrigerator up to 6 to 9 months. Its weight can be up to 8% more than original uncured weight due to uptake of water during curing. It need not be labeled "Added water" except for "In Natural Juices." Net Weight is the weight of the actual ham excluding the container. Processed at a time/temperature sufficient to kill infectious organisms (including Trichinae) but the ham is not sterilized so spoilage bacteria may grow eventually.

**CAPACOLLA** - Boneless pork shoulder butts which are dry cured; not necessarily cooked.

**HAM CAPACOLLA** is made with ham instead of pork shoulder butts.

**COOK BEFORE EATING** - needs further cooking. Is not completely cooked in the plant and should be cooked to 160° F.

**COTTAGE HAM** - a ham made from the shoulder butt end.

**COUNTRY HAM** - uncooked, cured, dried, smoked-or-unsmoked meat products made from a single piece of meat from the hind leg of a hog or from a single piece of meat from a pork shoulder. Smithfield and country hams are not fully cooked but are dry cured to be safe stored at room temperature. They should be cooked before eating according to manufacturer's instructions. A ham labeled "Smithfield Ham" must be processed in the city of Smithfield, Virginia.

**FRESH HAM** - the uncured leg of pork. Since the meat is not cured or smoked, it has the flavor of a fresh pork loin roast or pork chops. Its raw color is pinkish red and after cooking, grayish white.

**FULLY COOKED** - needs no further cooking. Fully cooked in plant. Can be eaten directly as it comes from its packaging or reheated.

**GELATIN** - about one-fourth ounce of dry gelatin is often added before a canned ham is sealed to cushion the ham during shipment. During processing, natural juices cook out of the ham and combine with the gelatin. When the ham cools, a jell forms. Gelatin is included in the net weight statement on the label.

**HAM** - the product is at least 20.5% protein in lean portion and contains no added water.

**HAM with NATURAL JUICES** - the product is at least 18.5% protein. Can weigh 8% more than uncured weight. Example: canned hams.

**HAM -- WATER ADDED** - the product is at least 17.0% protein with 10% added solution; it can weigh 8% more after curing than uncured.

**HAM AND WATER PRODUCTS** - Product may contain any amount of water but label must indicate percent of "added ingredients." For example, "X % of weight is added ingredients" for any canned ham with less than 17.0% protein.

**HAM STEAK** - another name for center cut ham slices.

**HICKORY-SMOKED HAM** - a cured ham which has been smoked by hanging over burning hickory wood chips in a smokehouse. May not be labeled "hickory smoked" unless hickory wood has been used.

**HONEY-CURED** - may be shown on the labeling of a cured product if honey is the only sweetening ingredient or is at least half the sweetening ingredients used, and if the honey is used in an amount sufficient to flavor and/or affect the appearance of the finished product.

**"LEAN" HAM** - The term "lean" may be used on a ham's label provided the product contains less than 10 grams fat, 4.5 grams or less of saturated fat, and less than 95 milligrams cholesterol per 100 grams and Reference Amount Customarily Consumed (RACC).

**"EXTRA LEAN" HAM** - A ham labeled "extra lean" must contain less than 5 grams fat, less than 2 grams saturated fat and the same cholesterol as allowed per the amount of "lean" ham.

**PICNIC, PORK SHOULDER PICNIC** - a front shoulder cut of pork which has been cured in the same manner as ham.

**PROSCIUTTO HAM** - An Italian-style dry cured raw ham; not smoked; often coated with pepper. Prosciutti can be eaten raw because of the way they are processed. **PARMA HAM** is prosciutto from the Parma locale in Italy. These hams tend to be larger than the U.S. produced product, as Italian hogs are larger at slaughter.

**SECTIONED AND FORMED or CHUNKED AND FORMED** - a boneless ham that is made from different cuts, tumbled or massaged and reassembled into a casing or mold and fully cooked. During this process it is usually thoroughly defatted.

**SHANK END, HALF OR PORTION** - the lower, slightly pointed part of the leg. A "portion" has the center slices removed for separate sale as "ham steaks" or center cut ham slices. The half includes this meat.

**SKINLESS, SHANKLESS** - A ham with all of the skin and the shank removed. The leg bone and aitch (hip) bone remain.

**SUGAR CURED** - a term that may appear on ham labels if cane or beet sugar is at least half the sweetening ingredients used and if the sugar is used in an amount sufficient to flavor and/or affect the appearance of the finished product. Most hams contain sugar in the curing mixture.

**WESTPHALIAN HAM** - A German-style dry cured ham that is similar to Prosciutto; smoked, sometimes with juniper berries. Also called Westfälischer Schinken.

## HAM STORAGE CHART

NOTE: Freezer storage is for quality only. Frozen hams remain safe indefinitely.

TYPE OF HAM	REFRIGERATE	FREEZE
Fresh (uncured) Ham, uncooked	3 to 5 days	6 mos
Fresh (uncured) Ham, cooked	3 to 4 days	3 to 4 mos
Cured Ham, cook-before-eating; uncooked	5 to 7 days OR Use-by date*	3 to 4 mos
Cured Ham, cook-before-eating; after consumer cooks it	3 to 5 days	1 to 2 mos
Fully Cooked Ham, vacuum sealed at plant, <i>undated</i> ; unopened	2 weeks	1 to 2 mos
Fully Cooked Ham, vacuum sealed at plant, <i>dated</i> ; unopened	Use by date*	1 to 2 mos
Fully Cooked Ham, vacuum sealed at plant, undated or dated; <i>opened</i>	3 to 5 days	1 to 2 mos
Fully Cooked Ham, whole, store wrapped	7 days	1 to 2 mos
Fully Cooked Ham, half, store wrapped	3 to 5 days	1 to 2 mos
Fully Cooked Ham, slices, store wrapped	3 to 5 days	1 to 2 mos
**Country Ham, uncooked, cut	2 to 3 mos	1 month
Country Ham, cooked	7 days	1 month
Canned Ham, labeled "Keep Refrigerated," unopened	6 to 9 mos	Do not freeze
Canned Ham, labeled "Keep Refrigerated," <i>opened</i>	7 days	1 to 2 mos
***Canned Ham, shelf stable, opened	3 to 4 days	1 to 2 mos

Lunch Meat Ham, sealed at plant, unopened	2 weeks OR Use-by date*	1 to 2 mos
Lunch Meat Ham, sealed at plant, <i>after opening</i>	3 to 5 days	1 to 2 mos
Lunch Meat Ham, sliced in store	3 to 5 days	1 to 2 mos
Prosciutto, Parma or Serrano Ham, dry Italian or Spanish type, cut	2 to 3 mos	1 month

\*Company stands by its "Use-by" date.\*\* A whole, uncut Country Ham can be stored safely at room temperature for up to 1 year. After one year the ham is safe but the quality may suffer.\*\*\* An unopened Shelf Stable Canned Ham may be stored at room temperature for 2 years.

### TIMETABLE FOR COOKING HAM

NOTE: Set oven temperature to 325° F. Both cook-before-eating cured and fresh hams should be cooked to 160° F. Reheat fully cooked ham to 140° F.

CUT	WEIGHT/lbs	MINUTES/lb
SMOKED HAM, cook-before-eating		
Whole, bone in	10 to 14	18 to 20
Half, bone in	5 to 7	22 to 25
Shank or Butt Portion, bone in	3 to 4	35 to 40
Arm Picnic Shoulder, boneless	5 to 8	30 to 35
Shoulder Roll (Butt), boneless	2 to 4	35 to 40
SMOKED HAM, fully cooked		
Whole, bone in	10 to 14	15 to 18
Half, bone in	5 to 7	18 to 24
Arm Picnic Shoulder, boneless	5 to 8	25 to 30
Canned ham, boneless	3 to 10	15 to 20
Vacuum packed, boneless	6 to 12	10 to 15
Spiral cut, whole or half	7 to 9	14 to 18
FRESH HAM, uncooked		

Whole leg, bone in	12 to 16	22 to 26
Whole leg, boneless	10 to 14	24 to 28
Half, bone in	5 to 8	35 to 40
Arm Picnic Shoulder, bone in	5 to 8	30 to 35
Arm Picnic Shoulder, boneless	3 to 5	35 to 40
<b>COUNTRY HAM</b>		
Whole or Half (Soak 4 to 12 hrs in refrigerator; then boil, covered with water. Drain, glaze and brown at 400° F 15 minutes.)	10 to 16, whole; 5 to 8, half	20 to 25

<b>MICROWAVING HAM</b>	<b>WEIGHT</b>	<b>MIN/LB on Medium/50%</b>
Cook-before-eating or fresh ham half or portion, bone in: Shield top cut edge with strip of aluminum foil; place in oven cooking bag in a baking dish; turn over and rotate midway through cooking.	5 to 7	12 to 15
Fully cooked half or portion, bone in: Shield top cut edge with strip of aluminum foil; cover with wax paper or vented plastic wrap; place in baking dish; turn over and rotate midway through cooking.	5 to 7	10 to 12
Fully cooked, boneless: Shield top edges with strip of aluminum foil; place in baking dish with 1/4 cup water; cover with vented plastic wrap; turn over and rotate midway through cooking.	2 to 5	10 to 12