



AgEcon SEARCH
RESEARCH IN AGRICULTURAL & APPLIED ECONOMICS

The World's Largest Open Access Agricultural & Applied Economics Digital Library

This document is discoverable and free to researchers across the globe due to the work of AgEcon Search.

Help ensure our sustainability.

Give to AgEcon Search

AgEcon Search
<http://ageconsearch.umn.edu>
aesearch@umn.edu

*Papers downloaded from **AgEcon Search** may be used for non-commercial purposes and personal study only. No other use, including posting to another Internet site, is permitted without permission from the copyright owner (not AgEcon Search), or as allowed under the provisions of Fair Use, U.S. Copyright Act, Title 17 U.S.C.*

1968-1978: More Fish, More Poultry, Less Red Meat

Kathryn Longen and Thomas Stucker
(202) 447-4943

citrus consumption has declined 12.3 percent since 1969, while frozen citrus juice consumption has increased 62 percent during the same time period.

Apple consumption increased from 17 to 17.2 pounds per person while other non-citrus fruit increased 1.7 percent from 40.4 to 41.1 pounds per capita in 1979. Bananas and peaches were among the fruits contributing to the increase. Apple consumption increased in the past decade until it peaked in 1976 and has been stable for the past 3 years. Other non-citrus fruit consumption has been steadily increasing since 1969 from 36.2 to 41.1 pounds per capita.

Canned fruit consumption increased from 19.0 to 19.2 pounds per capita in 1979. This 1-percent increase follows a series of steady declines from 24.2 pounds per capita in 1969 to 19.0 pounds per capita in 1978. Canned fruit juice consumption repeated the record high of 17.4 pounds per capita, which was reached in 1978 and maintained in 1979.

Flour and Cereal

Per capita consumption of wheat flour, including the amounts used by commercial bakeries, decreased 3 percent from 115 to 112 pounds. Rice consumption increased 71 percent from 5.8 pounds per capita, a record low, to 9.9 pounds per capita, a record high. Corn, oats, and barley consumption remained stable at 94.4 pounds, 7.0 pounds, and 1.9 pounds, respectively.

Coffee, Tea, or Cocoa

Per capita coffee consumption increased 9.5 percent in 1979, from 10.5 to 11.5 pounds (green-bean equivalent). Tea consumption remained at 0.74 pounds per person and cocoa consumption declined slightly from 3.4 to 3.2 pounds per person.

U.S. food consumption patterns have shifted significantly during the past decade due to increases in overall and relative food prices and supplies, new information on nutrition and food safety, and technological advances in food processing.

One of the most notable changes is the substantial increase in fish and poultry consumption over red meats. Between 1968 and 1978, per capita consumption of red meats increased only 0.3 percent. A 9-percent rise in beef consumption during this period was offset by decreases in the quantity consumed of pork, veal, lamb, and mutton. However, per capita consumption of poultry and fish rose 28.0 and 17.3 percent, respectively.

This same trend held true for poultry products in the preceding decade (1958-1968), when per capita consumption increased approximately 31 percent. In that period, consumption of beef rose 32 percent, pork 10 percent, and total red meats 17 percent, while per capita consumption of fish increased less than 4 percent.

Total domestic consumption grew

dramatically for poultry and fish, with poultry consumption increasing 40 percent between 1968 and 1978, and fish consumption more than 25 percent.

The shift from red meats during the past decade occurred simultaneously with price increases. Rising consumer incomes, however, have helped maintain a demand for all red meats. But this increased spending power, coupled with recent reduced beef supplies, has resulted in a 105-percent rise in beef prices since 1968. Similarly, retail pork prices have increased 115 percent from an average of 67 cents per pound in 1968 to \$1.44 per pound in 1978. When deflated by the change in the Consumer Price Index, these two price increases become "real" increases of 17.5 percent for beef and 27.5 percent for pork.

Poultry has become a relatively greater bargain. Retail chicken prices rose 67 percent between 1968 and 1978 (20 percent less than the rise in the general food price level), and turkey prices rose 76 percent (more than 11 percent less than general food prices). In 1978, retail prices for chicken and turkey averaged 68 and 82 cents per pound, res-

Percentage Change in Per Capita Consumption of Beef, Pork, Fish, and Poultry 1968-78

Food Item	1968	1978	Percentage Change (1958-68)	Percentage Change (1968-78)
Pounds				
Red Meats	148.9	149.3	17.2	0.3
Beef	81.2	88.9	31.8	9.5
Pork	61.4	56.5	9.6	-8.0
Veal	3.0	2.5	-48.3	-16.7
Lamb & Mutton	3.3	1.4	-10.8	-57.6
Poultry (Chicken & Turkey)	44.6	57.1	31.2	28.0
Fish	11.0	12.9	3.8	17.3

pectively. At approximately half the cost of beef and pork, poultry products are providing many consumers with a lower-priced alternative to red meat.

Medical Evidence

Some consumers may have opted to eat less red meat in response to medical evidence which suggests a correlation between consumption of these foods and the increased risk of cardiovascular disease, obesity, and cancer. The American Heart Association recommends meals of fish and poultry, which contain less saturated fat than red meat, and the use of lean or trimmed meat cuts. In general, red meats contain higher quantities of cholesterol than fish

and poultry products. For example, a 3-ounce serving of beef or pork contains 75 to 80 grams of cholesterol, versus 40 to 55 grams for a serving of cod or flounder and 65 to 70 for light meat chicken. High cholesterol levels have been cited as a possible precursor to arteriosclerotic heart disease.

Between 1972 and 1978, the number of establishments primarily selling chicken rose 55.9 percent. The number of seafood outlets increased over 656 percent, and now accounts for an estimated 60 percent of total fish consumption.¹ Improvements in the preparation and marketing of processed seafood products, such as frozen fish fillets, have encouraged the growth of



seafood establishments which now offer a variety of seafoods, including shrimp, clams, and oysters.

Easy Meals

Convenience products such as frozen prepared fish cakes, breaded shrimp, and seafood dinners have facilitated at-home consumption. Ease of preparation has made it possible to include seafood more often in the diet, especially for single-person and dual-career households.

The increased use of processed frozen fish products, both at home and away from home, has accounted for most of the growth in per capita fish consumption. Fresh and frozen fish consumption rose from 5.7 lbs. per person in 1960 to 7.9 lbs. per person in 1978, nearly a 40-percent increase. However, consumption of canned and cured fish has shown little change.

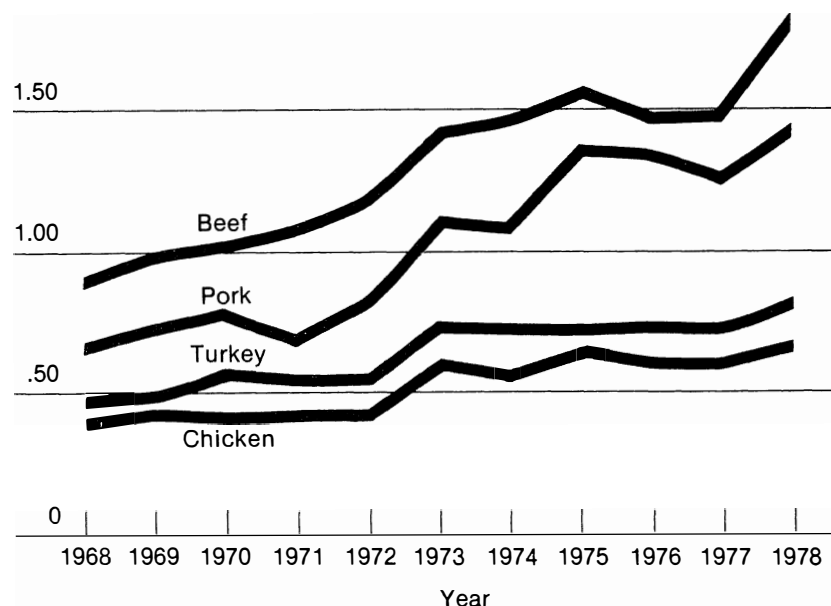
Thus, two types of change may be occurring in consumer demand for meat, poultry, and fish. The first is caused by a shift in relative price relationships and supply among fish, beef, and pork.

The second type of change is the possibility of a shift in demand for poultry and fish due to nutritional concerns or changing tastes and preferences.

During the 1980's, trends which are now being observed may prove to be due to long-term shifts as well as market adjustments to available supplies and prices.

Average Retail Prices for Beef, Pork, Chicken, and Turkey

Dollars per pound



¹ See "U.S. Fish Consumption and Price" by Theresa Sun, *National Food Review*, Winter 1979.