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Consumer preferences for poultry meat

Norman Nybroten

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Consumer Preferences for

Poultry Meat

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Summary

The average urban household in West Virginia buys more than a hundred pounds of poultry meat per year in addition to meals eaten away from home. Negro families are considerably better customers for poultry meat than white families—Negroes averaging 38 pounds per person per year, compared with 28 pounds for the white person.

Within reasonable limits—that is, for the great majority of incomes—the consumption of poultry meat increases only slightly with increased family income. As income increases, poultry meat accounts for a smaller percentage of the food bill, excepting in the lower-income Negro households.

Plumpness, skin color, and cleanliness are the principal factors homemakers stated as being most important to them in selecting chicken. Some of the factors used in grading chickens evidently are of no great concern to the homemaker.

Fresh poultry is a popular item with the West Virginia homemaker. About 97 per cent stated a preference for the fresh over the frozen product. A study of supermarket sales showed that less than 2 per cent of the poultry meat poundage was frozen.

About three-fourths of the households with freezers buy chicken to be put in the freezer. The most typical way of getting chickens for freezers is to buy whole birds directly from farmers and cut them up in the household. An overwhelming majority of the freezer owners prefer fresh poultry meat over the frozen product.

For 72 per cent of the homemakers, frying is the favorite method of preparing chicken. Roasting is the second most favorite, with 8.5 per cent of the homemakers preferring this method.

Homemakers, as a group, prefer a variety in weights of chicken. An average of 4.2 pounds was preferred for roasting, and 2.5 pounds for frying. Homemakers want more weight variation in fryers than is ordinarily available in the retail market.

More money could be obtained from fryers by differentiating them into two weight classes and charging a price premium for the heavier bird. This would be more feasible under certain conditions. It might pay better if fryer prices are relatively low. A 4-cent premium for heavy birds over lighter birds would return a greater net income to the retailer than a 1-cent premium for the heavy bird.

It is feasible, from the standpoint of consumers' opinions on relative values, to average a considerably higher price for fryers sold as separate parts (piece chicken) than for all parts of the fryer in one package. A rather common practice is for the retailer to recover the cost of the whole fryer in the prices of breasts and legs.

Homemakers apparently like to find the amount of the fryer part they want in a single package rather than having to take several packages. In a matched-lot experiment, more thighs were sold with the meat side showing than with the skin side showing.

Consumer Preferences for Poultry Meat

NORMAN NYBROTEN

Introduction

INFORMATION about consumers' desires, and how much they want of different items and services is of value to producers, merchants, and even to consumers themselves. Information on consumers' preferences enables producers and merchants to gain in that they are able to sell more products and perhaps at higher prices. By being informed, they are more able to cater to consumers' desires. Consumers gain by having their desires openly expressed and described, because in this way the products they want are more likely to be produced and made available on the market.

The desires for food seem to change from time to time. This is true for poultry meat. In the United States the consumption of chicken fryers has increased sevenfold since 1940. Some may argue that this increase came about because of change in the consumers, but the real cause of the rise has probably been in the market. The "red-meat" shortage during World War II encouraged fryer consumption, and the fryer industry made long-run gains and improvements out of short-run emergencies. Fryers began to receive great emphasis at the retail level of marketing. Although this report is on poultry meat generally, the fryer will receive the principal emphasis.

Studies of consumers' reactions to poultry meat have been made by the Agricultural Experiment Station of West Virginia University. Some of these have been in cooperation with the United States Department of Agriculture and some with the agricultural experiment stations in the Northeast Region, that is, the 12 northeastern states. Some of these studies are based on opinions of homemakers; some on shopping behavior under certain manipulated conditions; some are based on both opinion and behavior; and some on the merchandising practices of retail food stores. Some heretofore unreported parts of several studies under the author's supervision are included in this report. Several different factors have been studied and related to types of consumers and the part of the State and the income area in which they live.

Home Consumption of Poultry and Rabbit Meat

In a 1952 survey, 1,947 homemakers reported the amount of poultry meat they thought their households consumed. (See Table 1.) The

TABLE 1. CHICKEN CONSUMPTION PER CAPITA BY INCOME AREA IN WHICH HOUSEHOLD IS LOCATED AND GROCERY BILL*

INCOME AREA IN WHICH HOUSEHOLD IS LOCATED**	NUMBER OF HOUSEHOLDS	AV. NUMBER OF PEOPLE PER HOUSEHOLD	MONTHLY GROCERY BILL PER PERSON	POUNDS CHICKEN EATEN YEARLY PER PERSON	RATIO OF LB. TO DOLLARS GROC. BILL
			<i>Dollars</i>		
White householders					
Low	310	3.6	21	26	1.24
Medium Low	247	3.6	22	25	1.14
Medium	822	3.4	25	28	1.12
Medium High	200	3.4	28	30	1.07
High	149	3.4	34	30	.88
Negro householders					
Low	85	3.6	18	32	1.78
Medium Low	37	3.7	19	42	2.21
Medium	77	3.9	17	42	2.47
High	5	3.4	28	39	1.39
Total	1947†	3.5	24	29	1.21

*From a survey in 11 West Virginia cities made in 1952.

**The delineation of income areas was done mainly by city authorities and thus will not be entirely consistent from one city to another. Personnel of fire departments know their cities intimately and were very helpful in zoning the cities into income areas. In some cities—notably Huntington—such zoning had already been done for other purposes and the already-established zones were adapted to this study. The local Chamber of Commerce usually was helpful.

†The total includes 15 households which were not classified by race or income area.

average person consumed about 29 pounds of poultry meat annually, excluding meals eaten away from home. This means that the average household bought more than a hundred pounds of poultry meat per year.

Virtually all of the non-white households were Negro. They ate considerably more chicken per person than did the white people. The Negroes used an average of 141 pounds per household annually, or 38 pounds per person, whereas the white people used 97 pounds per household, or 28 pounds per person.

Income, up to a certain point, has a positive effect on the amount of chicken consumed by both Negro and white households. In general, chicken consumption in white households, from the standpoint of the number of pounds consumed, does not increase as rapidly with increased income as does expenditure for other groceries. To some extent this is offset in that households with better means buy the more expensive parts of the chicken. In the Negro households, up to a point, chicken consumption increases with increased income but the general grocery bill does not.

Turkey, duck, rabbit, and goose consumption apparently can be increased in urban areas of West Virginia. (See Table 2.) If the potential increase is considered on a percentage basis, goose consumption can

TABLE 2. HOMEMAKERS' STATEMENTS ON CONDITIONS UNDER WHICH THEY MIGHT USE MORE TURKEY, DUCK, RABBIT OR GOOSE*

MEAT PRODUCT	HOMEMAKERS STATING THEY NOW USE THE PRODUCT	HOMEMAKERS STATING THAT THEY WOULD USE MORE OF THE PRODUCT UNDER THE FOLLOWING CONDITIONS			
		MORE EASILY AVAILABLE	SMALLER CUTS OR PIECES	LESS EXPENSIVE	SMALLER ANIMALS
	%	%	%	%	%
Turkey	78	1.2	9.3	6.3	4.8
Duck	9	3.9	.2	1.3	.1
Rabbit	10	4.4	.1	1.1	0
Goose	1	1.0	.1	.4	.1

*Based on responses from 2,125 homemakers in 11 different West Virginia cities in 1952.

be raised about 150 per cent; but this still would not be much poundage, because only 1 per cent of the homemakers now buy goose. Duck and rabbit could be increased about 50 per cent. Turkey, now bought by about three-fourths of the homemakers, could be increased by about one-fourth of the present consumption. Evidently availability of smaller cuts, or smaller animals, would be very important in influencing the homemaker to buy more turkey. Homemakers could be influenced to buy considerably more rabbit, duck, or goose if these were more available in the market.

Homemakers' Concepts of a Good Chicken

Homemakers in more than two thousand households answered the open question, "If you are picking out chicken for yourself, what are the main things you look for that makes you feel that it is a good chicken?" This gave the homemaker opportunity to name several factors. Table 3 shows the prevalence of the different ideas mentioned first.

This approach to the problem may have caused the homemaker to think in terms of the poultry meat ordinarily available to her rather

TABLE 3. FEATURES OF FIRST IMPORTANCE TO HOMEMAKERS IN SELECTING CHICKEN

FEATURE	PERCENTAGE OF HOMEMAKERS RANKING THE FEATURE OF FIRST IMPORTANCE
Plumpness	29.4
Skin color	26.4
Cleanliness	14.9
Firmness and flesh condition	5.4
Pliable breast bone	4.3
Pin feathers	2.0
Odor	1.2
Miscellaneous	16.4

than to cause her to think of features that *might* be of importance. Although many of these homemakers have opportunity to buy in stores selling chicken under brand name, only two of the more than two thousand mentioned "brand" first. None on the homemakers mentioned "grade" first!

Self-Service Effects

It is difficult to study the sole effects of self-service, as against complete counter service, on the sales of chicken fryers because stores that shift to self-service also usually modernize in other ways at the same time. In a 1954 study of supermarkets that had shifted to self-service, it was learned that the store managers and heads of meat departments were enthusiastic about the effects on sales. Some of the managers claimed that self-service multiplied sales of fryers several times.

In 1952 more than two thousand homemakers in 11 West Virginia cities were interviewed to learn some of their main opinions concerning poultry marketing. More than two-thirds of the homemakers stated that they would rather pick out a whole bird and have the meat cutter cut it up than to pick an already cut-up bird out of the display. It seems, however, that the homemaker is rapidly being won over to complete self-service on poultry meat.

Many of the large food stores in the State offer to cut up a whole bird after the customer has selected it from the self-service display. Very few customers take advantage of this offer. This may not be a fair measure of the merits of the practice, however, because, even though the offer is actually made, it is discouraged by personnel in meat departments.

Frozen vs. Fresh Chicken

West Virginia food shoppers and homemakers show an overwhelming preference for fresh poultry over the frozen product. Of a total of 1,726 selected homemakers only 60—an average of about one in thirty—preferred frozen poultry over fresh poultry.

Sales of both frozen and fresh poultry were studied for a sample of food supermarkets. The time of the sales was selected to represent all seasons of the year. In this study, 83,591 pounds of chicken meat were sold but only 1,561 pounds were frozen. Actually, less than 2 per cent of the chicken meat poundage sold was frozen. This was somewhat less than might be expected from the survey, but it is probable that those who prefer the frozen chicken meat do not use as many pounds of chicken as those who prefer fresh. Frozen poultry meat was available to customers virtually all of the time, so, if anything, the difference in avail-

ability favored the frozen meat. Of the piece chicken sold, the higher-priced parts are available as a frozen product more commonly than the lower-priced parts. There was, however, no relationship between the income area in which people live and their opinions on frozen vs. fresh poultry meat.

Food freezer facilities were available to only a little more than 5 per cent of the households in a survey of 11 West Virginia cities. Most of the freezers were located in the household, with the others being at one of the State's few commercial food locker plants. On the average, a person in a household with a freezer consumed about five more pounds of chicken annually than a person living in a household without a freezer. This might be expected because—in the households having freezers—incomes were about one-and-one-half-times average; net worth was about two-and-one-half-times average; and the grocery bill was about \$103 per month compared with about \$80 per month in other households. At the time of the survey, the freezers contained an average of about 9.5 pounds of chicken meat. The majority of the freezers ranged from 8 to 18 cubic feet in size; the largest was 50 cubic feet.

The most common and biggest source of chicken to be placed in freezers is direct from farmers. Although supplying somewhat less than half of these chickens, the regular food store is the second most common source.

Three-fourths of the homemakers who have freezers buy chicken to put in the freezer. A heavier-than-average bird is likely to go into the freezer. Sixty per cent of the homemakers having freezers stated that they bought birds weighing 3 pounds or more—half of these being 4 pounds or more.

The most common practice is to buy whole birds for home freezers. Only about 3 per cent of the homemakers buying chicken for food freezers stated that they do not buy whole birds. In about 60 per cent of the cases the birds arrive at the household as whole birds and are then cut up. About 85 per cent of the homemakers stated that they see the birds before they buy. In half of the instances the homemaker cuts the birds into pieces. The retail store, ranking next to the homemaker, does nearly all the rest of the cutting. Although farmers are the most important direct supply, they cut into pieces only about 4 per cent of the birds going into food freezers.

About 40 per cent of the owners of home freezers buy chicken parts for their freezers. This is restricted almost entirely to the higher-priced parts of the chicken. In nearly all instances either or both breast and part or all of the leg were bought. Giblets were bought by about 6 per cent of these homemakers. Indications are that the home freezer will not be a significant factor in the demand for poultry meat. Most of the

homemakers with freezer facilities preferred the fresh product. The only feature that might appear important to poultry producers and merchants in the trend toward more freezers is that the freezer would result in more direct farmer-to-consumer marketing.

Favorite Ways of Cooking Chicken

Of 2,126 West Virginia homemakers, 72 per cent stated that their favorite way of cooking chicken was to fry it. Even though the trade has termed the young birds as "broilers," only two-thirds of 1 per cent of these homemakers preferred to broil chicken. About one-twelfth of the homemakers preferred to roast chicken. The rest had miscellaneous preferences. Creamed chicken—a natural outlet for backs and necks—was the preferred method of preparation for only one-third of 1 per cent of the homemakers.

Relationships between cooking preferences and age of homemaker, family income, income area in which dwelling is located, occupation of the head of the household, and church affiliation were studied. One of the most distinct relationships was that of age of homemaker and the choice between frying and stewing—more older people preferring stewing and more younger people preferring frying. Families with lower incomes, age factor not having been eliminated, had a higher preference for either roasting or stewing but a lower preference for frying. (See Table 4.)

TABLE 4. FAVORITE WAYS OF COOKING CHICKEN IN COMPARISON TO FAMILY INCOME

FAMILY INCOME	HOMEMAKERS STATING THAT PREFERRED WAY OF COOKING CHICKEN IS:			
	FRYING	ROASTING	STEWING	OTHER
	%	%	%	%
Less than \$1,500	56.4	12.7	15.7	15.2
\$1,500 to \$2,999	78.4	6.7	5.8	9.1
\$3,000 to \$4,499	76.1	6.9	6.2	10.8
\$4,500 to \$5,999	74.7	8.8	3.1	13.4
\$6,000 and over	76.9	6.9	1.6	14.6

Cooking preference was not associated with the occupation of the head of the household except for those calling themselves "pensioners," which really becomes a description of age and income status rather than occupational status. The cooking preference did not vary by the income area in which the household was located. There was no difference between Catholics and Protestants. Negro homemakers in low-income areas gave a lower preference for frying than those in other areas. This suggests that the favorite way of cooking chicken is influenced by the market price of chickens suitable for different ways of cooking. Except

for the Negroes in low-income areas, Negro homemakers had a higher preference for frying than did the white homemakers.

It appears that the retail trade could afford to give more emphasis to the roasting chicken. Five large stores that seemed outstanding in retailing fryers were selected for studying their methods of retailing roasters. These stores represented four different chain-store organizations. In 312 visits to poultry meat displays, roasters were on display only 107 times. Besides not being available much of the time, the birds on display were usually not heavy enough to be of good roasting quality. Stewers were available about 60 per cent of the time—this varying considerably among stores.

In what might be the State's most outstanding store from the standpoint of retailing poultry meat, the selling of more than 140 thousand pounds of chicken meat was studied. Of this total, only 2.2 per cent was roasting chicken, which might be compared with 8.5 per cent of the homemakers stating that roasting is their favorite way of preparing chicken. (See Table 4.) The roaster was available in the display in only 15 of 49 visits. In this store, fryers represented 82.6 per cent of the poundage and stewers 15.2 per cent. In another group of stores, in which sales of more than a half million pounds of chicken were studied, only 1.1 per cent of the poundage was classed as roasters in the wholesale trade.

Variety of Chicken Weights Wanted

Homemakers vary widely in what weight chicken they prefer. Although much of this variation was associated with the size of family and the manner in which the bird would be prepared, (See Table 5) there was also much variation *within* these groupings. Take, for example, the bird to be fried by the homemaker in a 3-person household—36 per cent of these homemakers stated a preference for the 2.5-pound bird, 34 per cent the 2-pound bird, and 20 per cent the 3-pound bird. The

TABLE 5. AVERAGE DRESSED-WEIGHT CHICKEN PREFERRED FOR DIFFERENT PURPOSES BY NUMBER OF PERSONS IN THE HOUSEHOLD

PERSONS IN HOUSEHOLD	WEIGHT CHICKEN (IN POUNDS) PREFERRED FOR—			
	FRYING	ROASTING	STEWING	BROILING
1	2.3	4.1	3.3	1.8
2	2.5	4.1	3.7	2.3
3	2.5	4.2	3.7	2.4
4	2.6	4.3	3.9	2.3
5	2.7	4.4	4.0	2.5
6	2.7	4.4	4.2	3.4
7 and over	2.7	4.6	4.2	3.9
Average	2.5	4.2	3.8	2.5

range for this group was from 1½ pounds to 5 pounds for frying. Other groups showed about the same degree and type of variation in preference.

Figure 1 shows the percentages of fryers in different weight classes found in 1,732 visits to self-service meat displays. It also shows percentages of homemakers stating preferences for different fryer weights. More than half of the fryers found were in the 2½-pound class—from 2 pounds and 5 ounces to 2 pounds and 12 ounces. Only one-third of the homemakers stated preference for fryers of this weight. In heavier and lighter weights the reverse is true—larger percentages of homemakers wanted these birds than the percentages of the fryers available.

FIGURE 1. Percentage of fryers found in different weight classes in retail stores compared with percentage of homemakers expressing preference for fryers of different weight.

The weight-variety question was approached in another manner. The weights of individual birds were recorded for "full" displays and "run-down" displays in 31 supermarkets.¹ The average-size bird was just as likely to remain in the display as the out-sized bird. These results were further verified by taking hourly inventories of individual birds in the displays to learn what weight bird required more time to sell.

¹By a "full" display is here meant a display that is not in need of replenishment from either the standpoint of the amount or variety on display, whereas the "run-down" display is in need of replenishment for either or both of these factors.

There is some tendency for packers in slaughter plants to group birds by weight when they pack them on ice in cases to go to retail establishments. Part of this is probably caused by more variation among flocks than within flocks entering the slaughter line. In a given case the weights will tend to be "run-of-the-flock" rather than "run-of-the-plant." This tends to vary the size of birds in the display from one time to another, but it decreases the weight variation in the display at a given time. Indications are that, except for special customers, it would be better from a sales standpoint to put run-of-the-plant birds, rather than out-size averages of birds from individual flocks, in each case going to retailers. In retail orders involving several cases, the variation could be provided by supplying cases of different weights—but, since there are about 25 birds per case, this still leaves somewhat of a problem in getting weight variation into the display at a given point of time. If the birds are to be retailed in more than one weight class—as discussed in the following section—the practice of ordering different case weights may be found desirable.

Use of Two Weight Classes of Fryers

A retail store experiment was set up in the spring of 1955 to test the feasibility of retailing fryers in two weight classes designated as "Heavy" and "Light." This experiment was run for 12 weeks in three large supermarkets in the Charleston, West Virginia area. The display, which was under continuous attendance, definitely called the customer's attention to the innovation of weight classes and the prices on the two classes. (See Figure 2.)

To accomplish the general objective of this study two things were done. An effort was made to determine how much of each weight class could be sold under various price differences; and the best "scaling point" (lower weight limit of the Heavy class) was sought.

Figure 3 shows the relative poundages of Heavy and Light fryers at three different price premiums for the Heavy over the Light. At a 1-cent difference the Heavy fryers represented about one-third of the total. There was a slight decrease in the sales of Heavy as a result of increasing the premium from 1 to 2 cents, but there was no further decrease as a result of shifting from a 2- to a 4-cent premium.

Figure 4 shows that the scaling point used to separate the birds into the two weight classes has an effect on the relationship between the per cent of the total fryer weight sold as Heavy and the per cent Light. That is, the poundage of Heavy decreased when the higher scaling point was used. Each scaling point was used for three weeks in each store.

During the 12 weeks of this experiment the retail prices of fryers varied through the wide range of from 45 to 61 cents per pound. This

FIGURE 2. Matched-lot display of light and heavy fryers. In this experiment, light and heavy fryers were offered in continuous competition with various price premiums on the heavy fryer. The photograph shows the almost-ever-present attendant who has just completed one of her hourly records from which she is calculating the sales of the previous hour and how to replenish the display.

gave opportunity to study the effect of the level of fryer prices. Figure 5 shows how the relative sales of Heavy and Light fryers are affected by the general price of fryers. More Heavy fryers could be sold at a premium when prices of fryers are lower.

This experiment fairly well substantiates what was learned in this regard by interviewing homemakers—that a considerable portion of homemakers have a distinct preference for the heavier fryer. It was learned that gross revenue from fryers can be increased by pricing the Heavy higher than the Light fryer. A comparison with other stores (a control group) showed that poundage of sales did not decrease—may have increased slightly—from offering the two weight classes. Indications are that stores could gain most by offering the two weight classes when fryers are low enough in price to be used as “leaders” or “specials.” The scaling point should take into consideration the weight distribution of fryers available, but it should be borne in mind that sales of Heavy

FIGURE 3. Relative sales of heavy and light fryers with three different per-pound price premiums on the heavy fryer.

FIGURE 4. Percentages of total fryers sold that were heavy and that were light when four different scaling points were used to divide the fryers into the two weight classes.

FIGURE 5. Relative sales of heavy and light fryers with the price of the light fryers at four different levels and the price premium on heavy fryers over light fryers the same for all price levels.

relative to sales of Light decrease as the scaling point increases. More gross revenue will result from a 4-cent premium than from either a 1- or 2-cent premium on the Heavy fryer.

Further research seems warranted to determine at what relative prices Heavy would be a "good buy" so far as the consumer is concerned and also to determine the relative costs of growing and processing the Heavy fryer compared with the Light fryer.

Preferences Related to Piece Chicken

Piece chicken is chicken which is cut up and the different parts priced and sold separately. If all the parts of a chicken—although entirely cut up into parts—are sold as a packaged unit, it is not considered as piece chicken. Piece-chicken marketing has become very effective in recent years. In fact, retailers often expressed the view that the piece-chicken sales have had to "carry" the fryer (whole or cut-up fryer) marketing because the fryer is a very competitive product and the margin is low. This means that the average price of fryer sold as piece chicken is almost always considerably higher than the price of whole fryers or all parts in one package.

The retailer adds value to the fryer by arranging it so that different customers need pay for only the parts they most want. In a 1952 survey in 11 West Virginia cities, homemakers were asked to give their opinions on the relative values of fryer parts compared with either butt half of smoked ham or ground beef at 65 cents a pound. With this assumption in mind, the homemakers gave an average of 56 cents for the drawn bird. An analysis of their values placed on fryer parts indicated that 10 cents more per pound (66 cents) could be obtained by selling the fryer as piece chicken.* Many people do not care much or at all for certain parts of the chicken. Liver is the most notable example of this—a fairly large percentage of the homemakers stating that they would pay nothing for liver. Even though this is the case, there are enough fanciers of liver to bring a high price for the relatively small supply. Only if liver is sold as a separate part is it possible to cater to these special people and to receive this high price.

It seems customary for many of the large food stores to price breast and legs high enough to pay the store's costs of the whole bird. Visits to 51 of West Virginia's largest supermarkets in June, 1954, revealed that it would almost invariably pay for the homemaker to buy all the parts in one package rather than buy breast and leg at the piece-chicken prices. Retailers willingly admitted that this was the case, but gave no reason for this practice other than expediency.

Alternatives in merchandising piece chicken are evident from the variation in practices among stores. There is evidence that retailers are not in agreement on the effectiveness of practices relating to piece chicken, even when they are competing for the same customers.

Whether to offer the chicken leg as a whole leg, as thighs and drumsticks sold separately, or as thighs and drumsticks cut apart in the same package, has been studied. In a survey, more than two thousand homemakers were asked, "Do you prefer that your butcher separate the drumstick from the thigh?" Fifty-seven per cent wanted them separated, 26 per cent did not, and 17 per cent stated that it makes no difference.

The question of separating thighs and drumsticks was studied experimentally. In a self-service store, whole legs were offered competitively against drumstick and thighs (in equal numbers) in the same package. On a weight basis, 38 per cent of the sales were the whole leg and 62 per cent drumsticks and thighs. Indications are that more leg meat could be sold if offered both ways.

*This average was a "weighted" average but it was also based on a marginal analysis. In this analysis it was assumed that the buyer would take the "best buy" in terms of her expressed choice and that the relative supply of the different parts were the cut-out yields from the bird. This, of course, means that all homemakers will not buy all parts and usually results in higher values and prices. For example, the average value placed on liver by all homemakers was 59 cents per pound but the lowest price quoted by the "marginal buyer" was \$1.00. At \$1.00 there would theoretically be about enough liver to meet the demand but at 59 cents a run would develop and the supply would soon be exhausted.

Food stores, and even whole chains, differ as to the method of offering thighs. Some offer thighs with the skin exposed to view, whereas others offer them with the meat showing. This alternative was tested experimentally, and sales were 69 per cent meat showing, and 31 per cent skin showing. This should not be interpreted to mean that packing the thighs with the meat showing should be the only way to pack. It does mean, however, that the retailer who has been selling them with only skin showing can probably please more customers by exhibiting at least part of them with the meat showing. Relative sales of the two offerings would then dictate relative amounts to be packed each way.

Attendants of piece-chicken displays seem prone to make packages of a certain fryer part about the same weight. In some instances it is evident that the weight of the package has been determined by the size of the tray used. For example, if a store uses a certain tray for wings, it is probable that there will be a normal number in a package and hardly ever will an individual package differ more than one or two wings from this normal. Experimental sales, under detailed observation, indicate that sales of piece chicken can be increased by varying the size of the package so that there is a choice on display. In the experiment, as many as 24 wings in one package, and 12 thighs or drumsticks in one package, were sold satisfactorily so far as display time is concerned. It appears that customers desire the correct amount in one package instead of having to combine packages. Logically, both the arithmetic and the carrying and storage involved in several packages would favor the correct amount in one package.

Packing fryer parts attractively in the tray influenced sales. Different symmetric patterns seem to be preferred. Drumsticks sold better placed in alternated directions in the tray, which also makes for the best use of space. Back and neck, cut commercial style, sold better with the backbone broken just back of the base of the neck, and folded under the rear part of the back. As in the instance of drumsticks, it was also possible to use tray space to better advantage. Larger packages of back and neck, up to 5 or 6 pounds, sold without any difficulty in the experiment.

Conclusions

Poultry meat sales can be increased, and consumers better satisfied if some rather general misconceptions of consumer preference were discarded. Although a display of uniformly-sized packages of piece chicken may be pleasing to the eye, if the over-all view of the display is taken, it is not likely to be most effective in selling piece chicken. Both opinion

surveys and experimental sales showed that offerings of various-sized packages would more nearly satisfy the total demands of consumers. This was true of both all parts of the fryer in one package and piece-chicken sales. In the case of piece chicken it was found that larger-size packages would increase sales and would reduce marketing costs.

The retailer should strive to keep a variety of fryer sizes available in his display. This seems especially important when fryer chicken prices are relatively low. The retailer should take this into consideration in making out his order for fryer supplies because his supplier can ordinarily provide the desired variation.

Although only a small percentage of households have food freezers, they may furnish a potential market for some poultry farmers. Indications are that this would be so for the farmer who would cut the chicken into pieces.

According to an opinion survey made in 1952 of more than 2,000 homemakers in the State, a sizable potential roaster market is very much neglected. The large self-service supermarkets are not catering to the expressed wishes of the homemakers in supplying roasters sufficient in either numbers or quality. Although further research may be needed to make firm recommendations as to how, or how many, roasters might be marketed economically in West Virginia, the retail trade should take the first step of trying to sell them by having them available more of the time. At present the roaster is available frequently in frozen form, but the great majority of homemakers indicated that they are not willing to substitute frozen for fresh chicken.