



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.

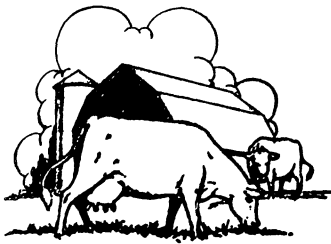
Give to AgEcon Search

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.*



MINNESOTA farm business NOTES



NO. 369

ST. PAUL CAMPUS, UNIVERSITY OF MINNESOTA

MARCH 30, 1956

Advertising Food Products: Facts and Fiction

R. A. Andrews and W. W. Cochrane

Much interest centers on advertising today as a means of increasing food consumption and reducing farm surpluses. Fabulous claims are sometimes made for advertising—how it has increased the consumption of some food items greatly, and how failure to advertise has led to surplus conditions in others.

On the other hand, advertising is debunked in other quarters. However, these claims and counterclaims shed little light on the amount of money expended for advertising food, or what different advertisers hope to accomplish through this medium, or what effect advertising may have on aggregate food consumption.

Advertising Expenditures for Food

The advertising bill for food products, including confections and soft drinks, was about 17 per cent of the total advertising bill in 1954 in the four major media: newspapers and newspaper supplements, magazines, network radio, and network television. Assuming that this percentage holds for all advertising, the bill for advertising food and food items in 1954 amounted to \$1.4 billion. (This is advertising alone, not the bill for total sales promotion.) Stated differently, 2.2 cents of the consumer's food dollar went for advertising in 1954.

Who Does the Advertising?

Available data indicate that farm commodity groups spent \$60 million on advertising in 1954, firms at the retail level spent \$350 million, and other "middlemen"—that is, firms other than retailers—spent \$1,020 million (table 1).

The increase in expenditures for advertising by farm groups from 1952 to 1954 reflects the increased interest by farmers in advertising as a means of dealing with abundant supplies.

Table 1. Advertising Expenditures by Marketing Level

Group	1952	1954
	millions	
Farm groups	\$ 42	\$ 60
Retailers	333	350
Other "middlemen"	855	1,020
Total	1,230	1,430

Source: Printers' Ink and Publishers Information Bureau.

Commodity Advertising

Estimates of advertising costs for individual farm commodities are at best vague. To present a comparison of expenditures by food items we must rely on one source—national advertising of groceries in newspapers. Assuming this to be reasonably representative of all advertising, the relative importance of advertising by commodities is as presented in table 2.

Table 2. Percentage Distribution of Expenditures for Food Advertising in Newspapers

Food item	1952	1954
	per cent	
Baking products	16.1	14.8
Beverages (total)	20.8	24.6
Cereals and breakfast foods	7.0	6.6
Condiments	7.4	6.3
Dairy products	14.1	14.8
Meats, fish, and poultry	6.9	8.9
Miscellaneous groceries	27.7	24.0
Total	100.0	100.0

Source: Bureau of Advertising, American Newspaper Publishers' Association.

The commodity group beverages has been the most advertised in recent years. The advertising expenditures for beverages has amounted to about one and a half times the expenditure for either dairy products or baking products and about three times the expenditure for each of the other major food groups.

What Are Advertisers Trying to Do?

Selling firms advertise to (1) expand the sales of a particular product, brand, or commodity, or the sales of a store;

and (2) to make the flow of purchases less responsive to price changes. The first objective is concerned with increasing sales at a given price; the second with that of increasing revenues with rising prices.

Increased sales from advertising at current prices come about in one of three ways: by introducing new consumers to a food item, by increasing the purchases of old, or regular, consumers, or by getting consumers to switch to the item in question from some other brand or product. The advertiser, however, is usually not concerned with the sources of new demand, or new customers, he wants new customers regardless of where they may come from.

But in many, if not most, cases new buyers of a food item are substituting the new, advertised item for some older food item. Farm people should recognize that sales made at the expense of competing firms or substitute items do not increase total sales of farm products.

At the retail level, the primary goal is to increase total sales of a particular store or chain of stores through attracting purchasers away from other stores in the community or from outside the community.

A common lure used to attract customers is selling goods below cost (the advertising of loss leaders). However, increased sales at one store from advertising do not necessarily mean an increase in total food sales. An increase in total food sales results only from all consumers using more food in the home.

"Middlemen" firms, other than retail, are the big advertisers creating and pushing most of the branded items and specialty products. They do most of the national advertising. And, through the use of brand names, they seek to increase the quantity consumed at a particular price and to cause consumers to become so devoted to a brand that

(Continued on page 3)

SOUTH ST. PAUL YARD IS A LEADER

Farhad Ghahraman and Philip M. Raup

In 1955, South St. Paul retained its position as the leading U. S. market in salable receipts of hogs and calves. It is the fourth largest cattle market (following Chicago, Omaha, and Sioux City) and the fifth largest market in sheep and lambs (following Denver, Fort Worth, Omaha, and Ogden).

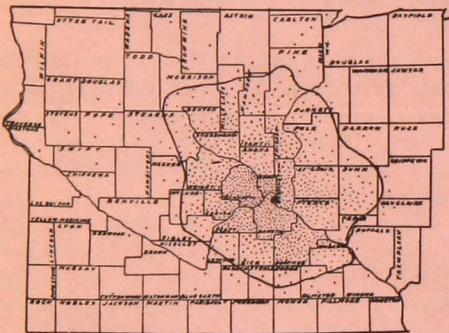


Fig. 1. Origin of loads of livestock trucked to South St. Paul in 1929. Each dot represents 100 loads or a major part of one.

South St. Paul was also the leading calf market 25 years ago, but ranked fourth in hogs and sixth in cattle and sheep. Accompanying the changes in

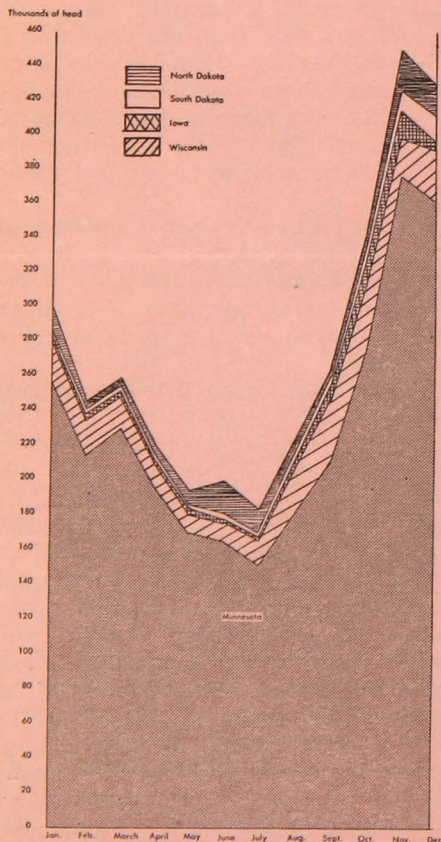
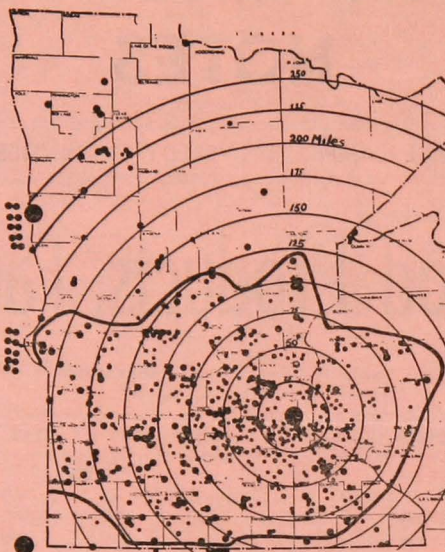


Fig. 2. Monthly hog receipts, South St. Paul, 1955.



- Trucks bringing more than 15 head
- Trucks bringing between 10-15 head
- Trucks bringing less than 10 head

Fig. 3. Origin of 5 per cent of the trucks that shipped cattle and calves to South St. Paul during the weeks of Jan. 16, April 17, July 17, and October 16, 1955.

the relative position of South St. Paul has been a major change in the means of livestock transportation. In 1929, trucks delivered 27 per cent of the cattle, 50 per cent of the calves, and 27 per cent of the hogs. In 1955 these percentages were: cattle, 91; calves, 96; and hogs, 96.

In 1929, the South St. Paul trucking territory was approximately 100 miles north, 70 miles west, 60 miles south, and 80 miles east of the market (figure 1). In 1955, this territory extended about 150 miles north, 175 miles west, and 100 miles south—while the eastern boundary remained about the same (figures 2 and 3).

The extension of the truck-in supply area has been closely associated with the expanded use of trucks and the improvement of roads. The shape of the boundary, on the other hand, traces the effect of neighboring markets.

In the northeast, the effect of Duluth is apparent. To the south, the boundary is clearly affected by the interior packing company markets at Austin, Albert Lea, and neighboring Iowa cities. Similar influences can be traced to Sioux Falls and Sioux City in the southwest, and to Fargo in the northwest.

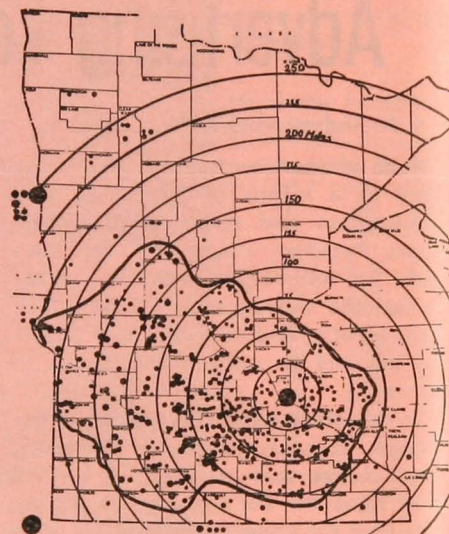
The month to month fluctuations in receipts (by rail and truck) are shown in figures 4, 5, and 6. About 69 per cent of the total cattle receipts in 1955 were from Minnesota, 10.6 per cent from North Dakota, 7.5 per cent from Wis-

MINNESOTA farm business

NOTES

Prepared by the Department of Agricultural Economics and Agricultural Extension Service.

Published by the University of Minnesota Agricultural Extension Service, Institute of Agriculture, St. Paul 1, Minnesota.



- Truckload of over 50 hogs
- Truckload between 26-50 hogs
- Truckload less than 26 hogs

Fig. 4. Origin of 5 per cent of the hog trucks received in South St. Paul during the weeks of Jan. 16, April 17, July 17, and Oct. 16, 1955.

consin, 6.5 per cent from South Dakota, 3.8 per cent from Iowa, and 2.6 per cent from Montana. Cattle receipts were heaviest in October (135,000) and lowest in July (82,000).

Minnesota and Wisconsin cattle marketed at South St. Paul were rather evenly distributed throughout 1955. The peak in fall receipts was accounted for almost entirely by heavy seasonal marketings from the Dakotas and Montana.

More than 80 per cent of calf receipts originated in Minnesota. Wisconsin supplied 10.5 per cent, while 3.7 per cent came from North Dakota, 2.6 per cent from South Dakota and Montana, and 2.3 per cent from Iowa. The heaviest calf receipts were in November (68,600) and the lowest in July (24,000).

The South St. Paul market was particularly dependent on Minnesota supplies for its hogs. In 1955, more than 84 per cent of the hogs arriving for market originated in Minnesota, 8.4 per cent in Wisconsin, 4.2 per cent in North Dakota, 1.8 per cent in South Dakota, and 1.2 per cent in Iowa.

The seasonal nature of the market is also most pronounced. Almost half of

Advertising—

(Continued from page 1)

they will stick to it when the price of the item increases. This is called differentiating the product, or making the demand for the item more inelastic.

It is a rare brand of food, however, that does not have a host of reasonably close substitutes. When one processor advertises some brand "A" in a given food line, processors of brands "B," "C," and "D" must also advertise to hold their share of the market. For, if the supplier of brand "B" does not advertise, he will lose buyers to brands "A," "C," and "D" on one hand and fail to acquire new buyers on the other. Thus, much of brand advertising is purely competitive in nature.

Advertising is an indispensable tool to a firm introducing a new food item. Advertising provides a quick and persuasive means of acquainting potential customers with a new item. Advertising of this kind is competitive from the beginning, because increased sales of a new food item usually come at the expense of old, established items. The new product must compete first with established commodities and second with established brands.

Margarine is a case in point. In its early sales history, all margarine processors found that advertising increased sales, and these sales were mostly at the expense of butter. But in recent years margarine advertising has become competitive among margarine brands as well as butter.

It is important to recognize also that an important share of advertising done by food processors and handlers is designed to sell more of the "products" of these handlers and processors, namely, services provided and special preparations and processing.

This type of advertising is designed to encourage the increased use of food preparations that save the housewife work such as packaged cake mixes and packaged individual whole meals. This is fine for processors and housewives, but the increased sale of cake mixes with a corresponding decline in the sale of cake flour does not mean increased food sales for the farmer.

The primary purpose of a farm commodity group in advertising is to increase the consumption of, or retard the declining demand for, the food commodity involved. Even here, conflicts of interest arise. The promotion of one farm product may adversely affect the sales of another or several other food commodities.

For example, if an advertising pro-

gram for beef is successful, the demand for other meats may, and likely will, be reduced. The extreme case of competitive advertising at this level is to be found in the advertising efforts of particular producer groups in the same commodity (for example, in potatoes and fruits and vegetables).

The Role of Advertising

It is thus seen that competitive advertising is involved at all levels of food handling. And, where substitution among food items occurs readily and typically, it is obvious that a large percentage of food advertising is competitive in nature.

However, the fact that 50 food handling firms each spent over a million dollars a year on advertising suggests that many firms feel that advertising is important to a successful operation.

Also, there is evidence to indicate that some farm groups have been successful in advertising campaigns (particularly in the case of specialty crops). But what may be a successful business policy for individual marketing firms and some farm groups will not necessarily be a desirable economic policy for all farmers. And it will not be, to the extent that advertising is competitive (that is, firms and groups seek an enlarged share of a given sized market).

This conclusion is buttressed by the well known inelasticity of the human stomach. The average consumer has consumed almost the same number of pounds each year since 1910—about 1,500 pounds per year. Poor consumers have almost the same poundage intake of food as rich consumers.

With rising incomes, however, consumers shift away from cereals, potatoes, and fats and toward more animal products. This is the only way that the average per capita consumption of food increases in the United States. If advertising could induce consumers to undertake this kind of substitution process within the total food budget of each consumer, this would expand the total demand for farm products.

But historical evidence suggests that this substitution of animal products for cereals, potatoes, and fats takes place only with rapidly rising real incomes, and not always then. (Witness the constancy of the index of per capita food consumption at 100 during the past 10 years.)

Thus, the role of advertising would appear to be that of helping individual firms expand the sales of their food items or brands, but not that of expanding the total food consumption of the average consumer.

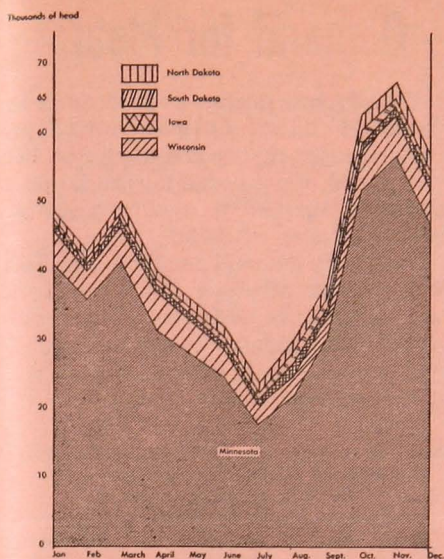


Fig. 5. Monthly calf receipts, South St. Paul, 1955.

the total 1955 supply was received in the three months of October, November, and December.

In 1955, the average load for hog trucks was about 25 head; trucks hauling cattle and calves averaged 10 head.

When averages were computed separately for 4 weeks, hog truck loads were biggest in the week of October when they averaged 31 head. Loads decreased to 27 head in January, 19 in April, and 18 in July.

The average for cattle and calf truck loads was 11.3 head in October, 9.4 in January and July, and 9.2 in April. The bigger loads of cattle and calves in October can be explained in terms of the higher percentage of calf receipt and the heavier seasonal marketings from Montana and the Dakotas.

The bigger hog truck loads originated west of South St. Paul, whereas the trucks hauling the bigger cattle and calf loads were more evenly distributed (figures 2 and 3).

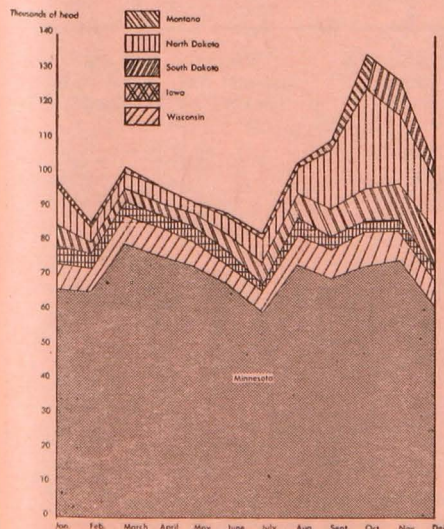


Fig. 6. Monthly cattle receipts, South St. Paul, 1955.

Minnesota Farm Prices, *The Outlook Corner* — Demand for Meat Jan. and Feb. 1956

Prepared by R. A. Andrews

Average Farm Prices for Minnesota, January 1956, February 1954, 1955, 1956*

	Jan. 1956	Feb. 1956	Feb. 1955	Feb. 1954
Wheat	\$2.12	\$2.09	\$2.26	\$2.17
Corn	1.12	1.13	1.23	1.29
Oats .....	.55	.55	.67	.71
Barley .....	.88	.88	1.06	1.11
Rye .....	.92	.91	1.12	1.03
Flax	3.02	3.13	3.04	3.52
Potatoes .....	.95	1.40	.80	.75
Hay	14.80	15.30	16.90	15.90
Soybeans†	2.13	2.18	2.50	2.86
Hogs	10.70	11.80	16.00	25.50
Cattle	12.90	13.40	16.50	15.40
Calves	17.50	17.80	17.80	20.00
Sheep-lambs	16.02	17.20	18.54	18.50
Chickens .....	.178	.188	.178	.217
Eggs .....	.370	.320	.350	.395
Butterfat .....	.620	.620	.620	.710
Milk	3.10	3.05	3.00	3.35
Wool† .....	.36	.38	.49	.47

* Average prices as reported by the USDA.

† Not included in Minnesota farm price indexes.

Minnesota farm prices fell to the lowest February level since 1946. The index dropped 19 points or 9 per cent from the 1955 February level. Low hog and cattle prices caused a 20 per cent decline in livestock price index. The crop price index increased 6 per cent, largely due to higher potato prices.

Comparison of January and February Prices

Commodity class	Average February prices as a percentage of average January prices
Crops	109
Livestock	107
Livestock products	98
All commodities	104

Indexes for Minnesota Agriculture*

	Average February 1935-39	February 1956	February 1955	February 1954
U. S. farm price index	100	207.0	224.4	236.3
Minnesota farm price index	100	180.9	199.4	233.0
Minnesota crop price index	100	189.7	178.3	178.2
Minnesota livestock price index.....	100	178.3	222.4	276.0
Minnesota livestock products price index	100	180.1	181.6	206.5
Purchasing power of farm products				
United States	100	92.5	99.3	104.9
Minnesota	100	80.9	83.1	103.5
U. S. hog-corn ratio	13.1	10.2	11.7	17.1
Minnesota hog-corn ratio	15.5	10.4	13.0	19.8
Minnesota beef-corn ratio	12.1	11.9	13.4	11.9
Minnesota egg-grain ratio	14.4	12.6	12.4	14.0
Minnesota butterfat-farm-grain ratio	34.2	34.0	28.9	31.4

* Minnesota index weights are the average of sales of the five corresponding months of 1935-39. U. S. index weights are the average sales for 60 months of 1935-39.

Meat consumption in this country corresponds fairly closely to meat production because exports and imports generally are of minor importance. Per capita consumption reached a peak in the early part of this century and a low during the late 1930's.

During the past three years, consumption climbed rapidly, and the level in 1955 was only slightly less than in the peak year of 1908. The high level reached in 1955 was a reflection of the marked increase in both beef and pork production.

The retail value of meat consumed follows closely the trend of personal incomes of consumers. Expenditures for meat have been roughly the same percentage of incomes in all years—except under wartime controls.

The retail value of meat in 1955 was slightly less than in 1954. It did not rise with rising consumer incomes, partly because meat supplies per capita were the largest in recent years. Retail value will continue to be sensitive to incomes, though it will not be as high relative to them as it was just after the war.

The percentage of income spent for beef has been steady over many years, while the percentage spent for pork has declined. Consumer demand has gradually shifted from pork to beef. This loss is, in part, due to a growing distaste for fat pork.

Demand and price have held up better for lean cuts than for fat cuts. The movement of the consuming population from pork-eating to beef-eating regions also is a cause. New methods of retailing meat, and increased use of freezers and lockers perhaps have aided demand for beef more than pork.

Usually, any decline in preference by consumers shows up most during periods of large supply and low price. For this reason, the attitude toward fat pork probably became a greater price-depressing factor in 1955.

Trends in demand for pork and beef will not be reversed this year. Pork will continue to be lower in price relative to beef than comparative supplies would indicate, but the situation will not change much from that of 1955.

Meat Consumption and the Proportion Retail Value Is of Disposable Personal Income in United States, 1920-55

	Per capita consumption			Retail value as proportion of disposable personal income
	All meat*	Beef	Pork	
	pounds			per cent
1920-24	139	58	68	6.1
1925-29	133	54	67	5.9
1930-34	132	51	67	5.9
1935-39	125	55	56	5.9
1940-44	144	56	72	4.6
1945-49	147	63	69	5.5
1950	143	63	68	5.7
1951	136	55	71	5.6
1952	144	62	72	5.7
1953	154	77	63	5.3
1954	153	79	60	5.4
1955†	161	81	66	5.2

* Includes beef, pork, veal, lamb, and mutton.

† Preliminary.

UNIVERSITY OF MINNESOTA, INSTITUTE OF AGRICULTURE, ST. PAUL 1, MINN.

Cooperative Extension Work in Agriculture and Home Economics, University of Minnesota, Agricultural Extension Service and United States Department of Agriculture Cooperating, Skuli Rutford, Director. Published in furtherance of Agricultural Extension Acts of May 8 and June 30, 1914.

UNIVERSITY OF MINNESOTA
Institute of Agriculture
Agricultural Extension
St. Paul 1, Minn.
SKULI RUTFORD, Director
Minn. 7-3-56-4,325
Permit No. 1201

PENALTY FOR PRIVATE
USE TO AVOID PAY-
MENT OF POSTAGE, \$300

FREE—Cooperative Agricultural Extension Work, Acts of May 8 and June 30, 1914.