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Incomes of Missouri Farmers



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1949-62

Farm operators receive "farm income" (from their farming operations) and "off-farm income" (from off-farm work and property, social security, etc.) Off-farm income is approaching farm income in size and significance for Missouri farmers.

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Gross Farm Income

The annual gross farm income received by Missouri farm operators declined \$241 million from the Korean conflict peak of \$1,313 million to the 1955 low of \$1,072 million, rose gradually from 1956 to 1960, and then jumped to a new high of \$1,385 million in 1962 (Chart 1).

These variations in gross farm income of Missouri farmers followed quite closely changes for the nation. Missouri gross farm income was 3.46 percent of the national gross for 1949-52 and 3.36 percent for 1959-62.

Several neighboring states improved their national percentages during this same period (Table 1).

TABLE 1 - PERCENTAGE STATE GROSS FARM INCOME IS OF NATIONAL TOTAL

4-Year Average	Mo.	Iowa	Ill.	Minn.	Neb.	Kan.
1949-52	3.46%	6.83%	5.87%	3.96%	3.35%	3.35%
1959-62	3.36%	6.91%	5.77%	4.17%	3.48%	3.60%

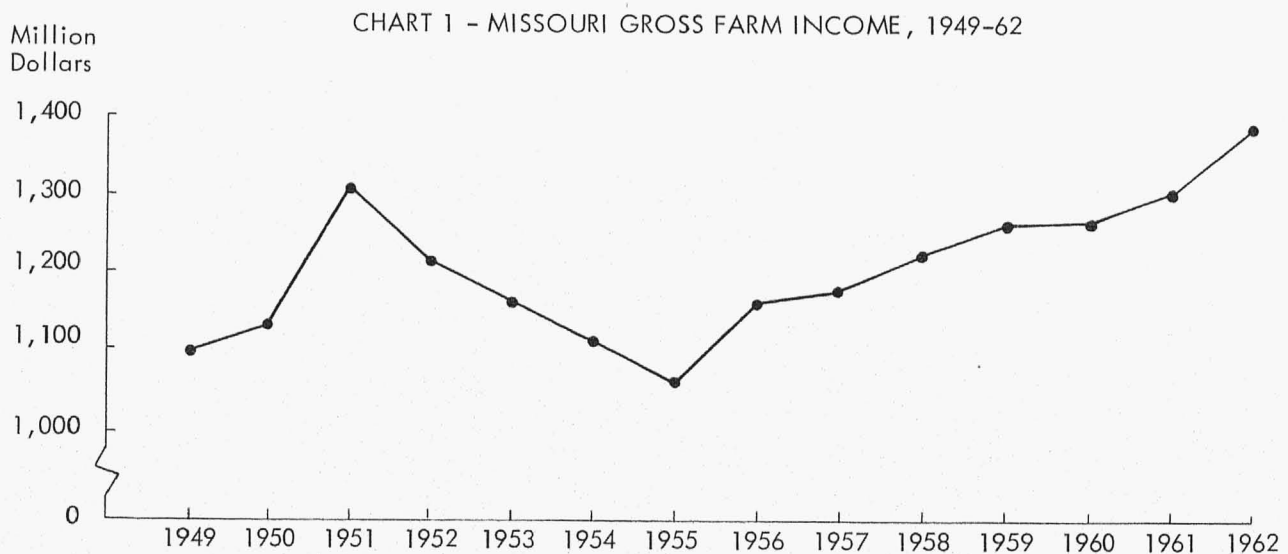
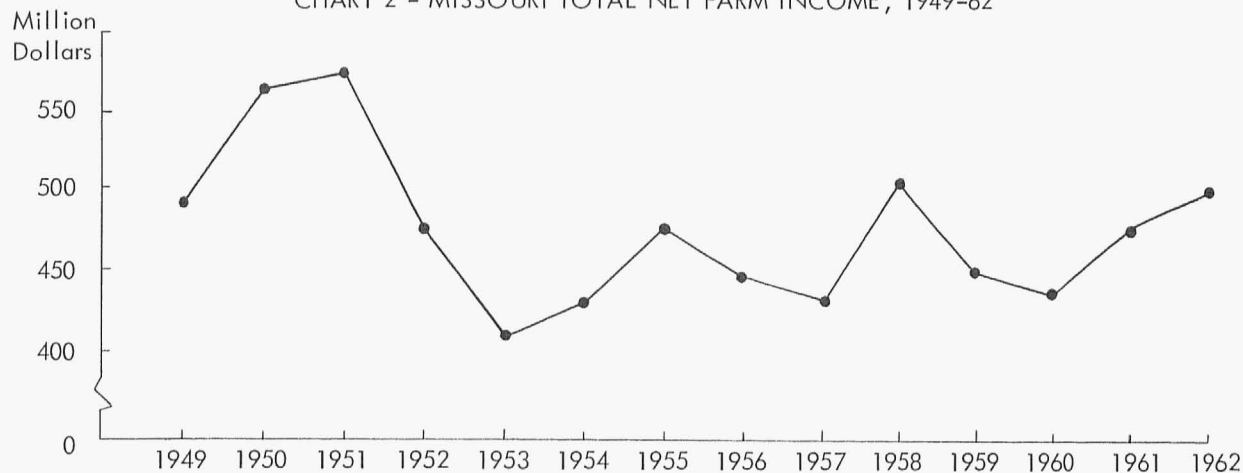


CHART 2 - MISSOURI TOTAL NET FARM INCOME, 1949-62



Total Net Farm Income

Total net farm income equals:
 Realized gross farm income,
 Minus production expenses,
 Plus or minus any net change in farm inventories.

The total net farm income of Missouri farmers has ranged from \$577 million in 1951 to \$415 million only two years later (Chart 2). Since 1951 the 500 million mark has been surpassed only twice—1958 and 1962. The trend has been down from the high price days of the Korean conflict. Average net farm incomes for 1959-62 were \$59 million under the 1949-52 average. If we were to drop out the Korean years as “abnormal,” the 1950’s would appear to be a period of no real trend in Missouri total net farm incomes.

Missouri’s total net farm income was a greater percentage of the national total than was its gross farm income, while the converse was true for several neighboring states (Tables 1 and 2). Missouri’s percentage of national net rose slightly during the decade.

TABLE 2 - PERCENTAGE STATE TOTAL NET FARM INCOME IS OF NATIONAL TOTAL

4-Year Average	Mo.	Iowa	Ill.	Minn.	Neb.	Kan.
1949-52	3.63%	6.74%	5.32%	3.85%	3.21%	3.17%
1959-62	3.82%	6.03%	5.19%	3.91%	3.17%	3.46%

Gross and Net Farm Income Per Farm

Income on a *per farm* basis has risen greatly during this period. Missouri’s 1949-52 average gross of \$5,080 per farm rose \$2,312 to an average gross of \$7,392 for 1959-62. Each year’s gross farm income per farm exceeded the previous year’s except in 1952, 1954, and 1955 (Chart 3).

Missouri’s gross and net income per farm figures have been consistently below the national average. For 1949-52 the Missouri gross and net figures were 80.3% and 84.1% of the national average, respectively; for 1959-62 Missouri gross and net figures were 73.6% and 83.6% of the nation’s.

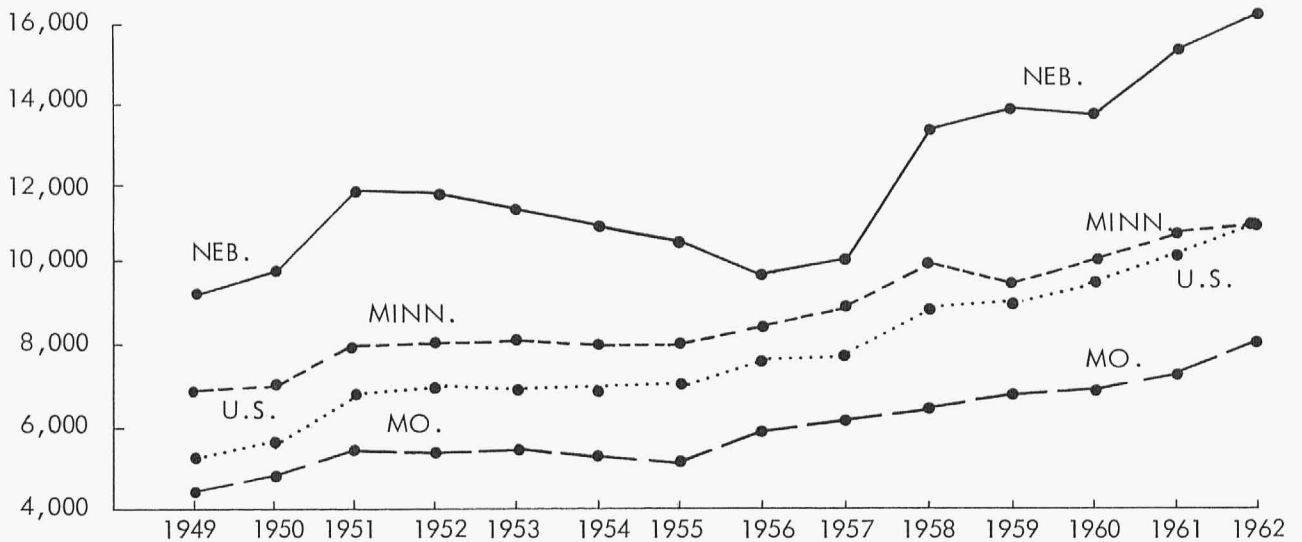
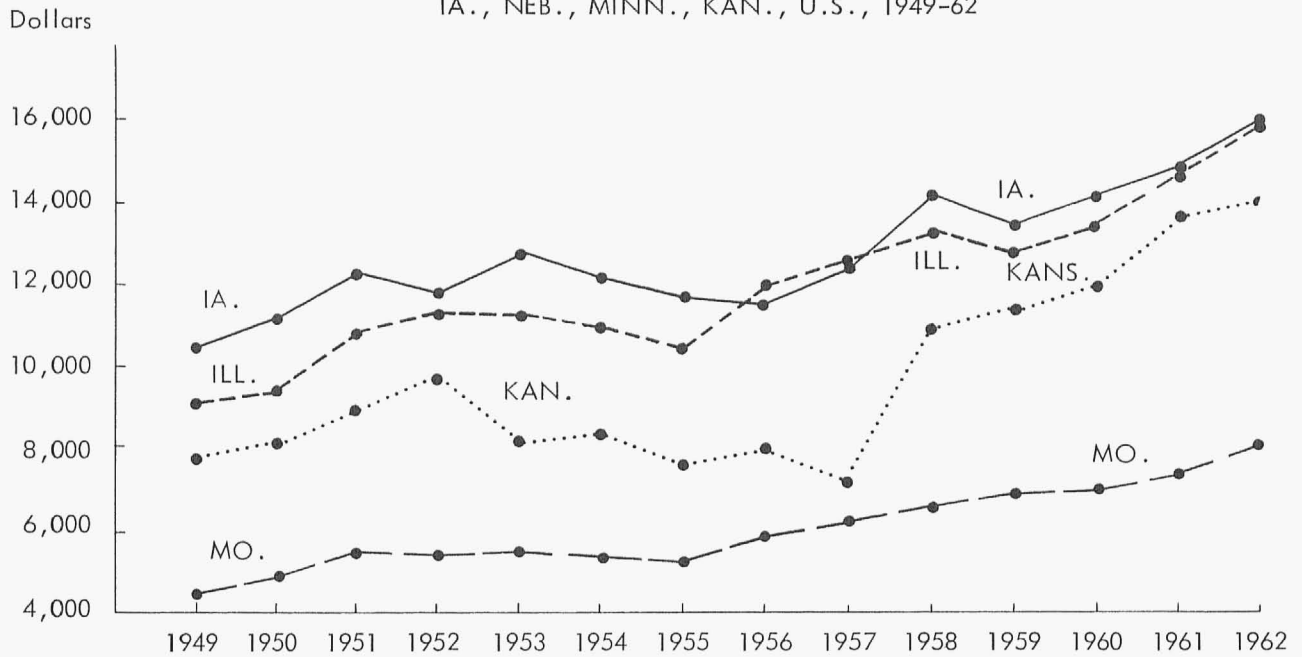
Two points are immediately obvious from Chart 3. First, Missouri’s gross per farm is at the bottom of the

list and below the U. S. average. Second, Missouri’s gross income per farm is quite stable compared to that of most of the other states and particularly as compared to the Plains states of Kansas and Nebraska. Missouri, Minnesota, and Iowa were not doing as well relative to the U. S. average in 1959-62 as in 1949-52, while Nebraska, Illinois, and Kansas gained relatively.

Missouri’s total net farm income per farm rose from an average of \$2,248 for 1949-52 to \$2,672 for 1959-62.

We can make two points from Chart 4 similar to the two points made from Chart 3. As in gross income, Missouri’s total net income per farm is at the bottom of the list and below the U. S. average. Moreover, Missouri’s net is more stable than that in most other states, par-

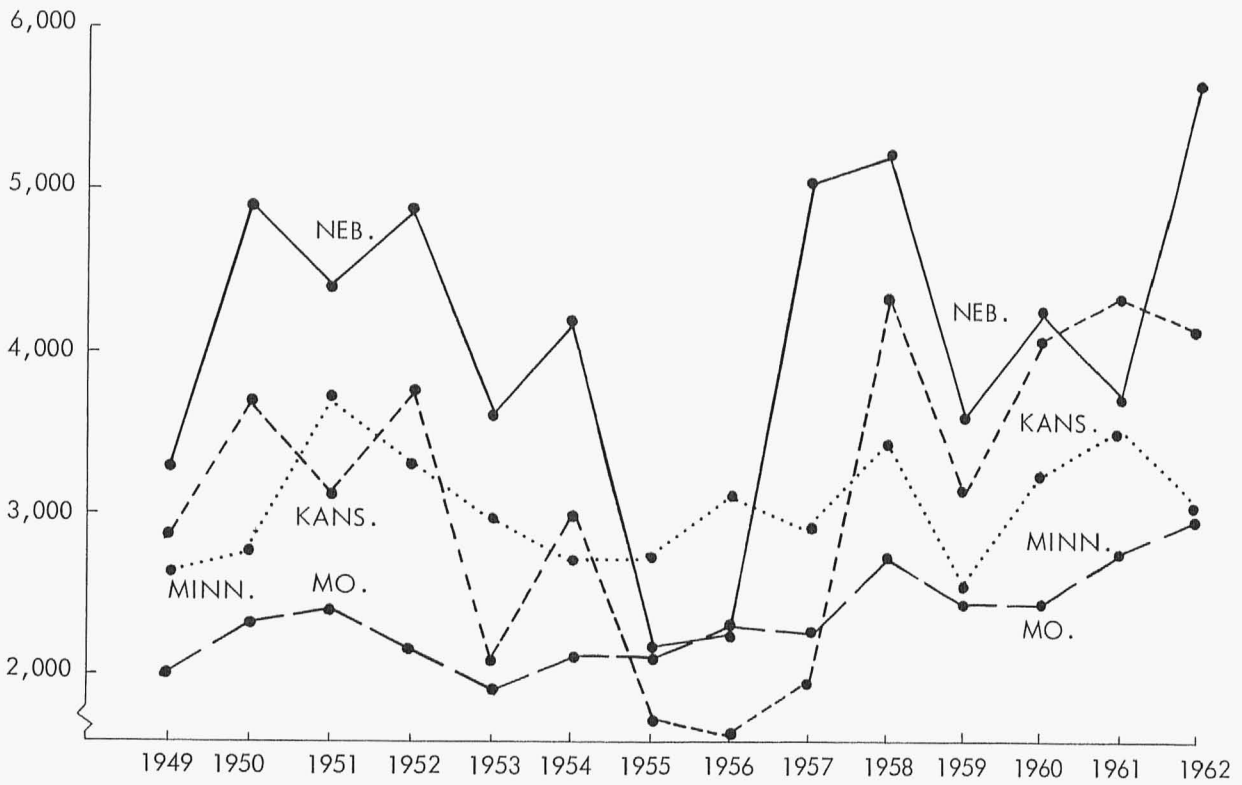
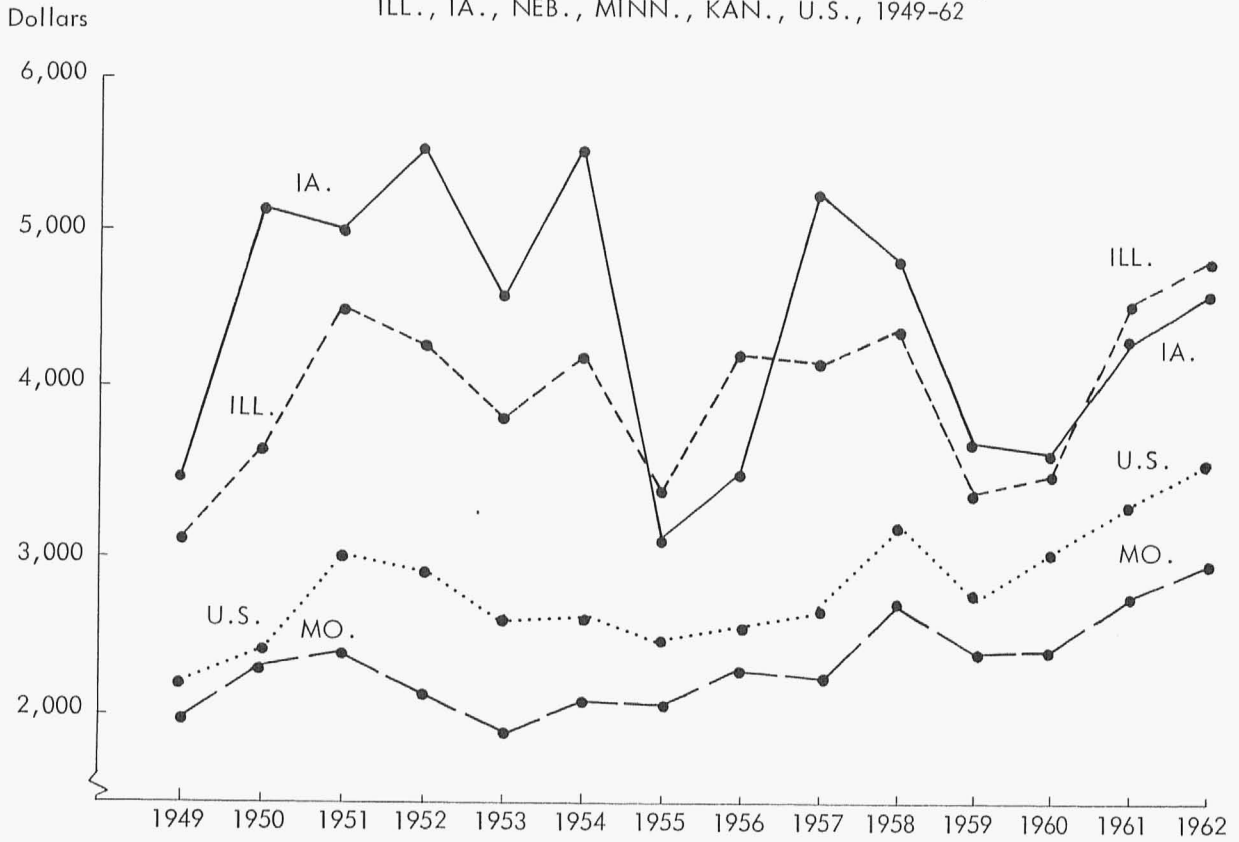
CHART 3 - REALIZED GROSS INCOME PER FARM FOR MO., ILL., IA., NEB., MINN., KAN., U.S., 1949-62



ticularly in Kansas, Nebraska, and Iowa. However, there are some differences between Charts 3 and 4. Missouri's net has gained from 1949-52 to 1959-62 relative to each state on the chart except Kansas. Whereas Iowa was at the top in 1949-52, its average fell \$740 by 1959-62 and was then below Illinois, the new leader. While Missouri

gained relative to several Corn Belt states, it lost relative to the U. S. and, therefore, relative to many states not charted here. Note that annual fluctuations have been so large that it is difficult to discern postwar trends with much accuracy.

CHART 4 - TOTAL NET INCOME PER FARM FOR MO.,
ILL., IA., NEB., MINN., KAN., U.S., 1949-62



Off-Farm Income and Work

Income of farm operator families from off-farm sources is quite large relative to net income from farm sources. However, data on this income are so poor that any estimates could be wrong by 15 or 20 percent. A special national study in 1960 estimates that 80 percent of farm-operator families received income from off-farm sources as contrasted with 70 percent only five years before. On the basis of national estimates from the 1959 census, off-farm income for Missouri farmers was about \$391 million—a very sizeable sum when compared with the 454 million total net farm income from farm sources that year.

TABLE 3 - ESTIMATED INCOME OF MISSOURI FARM OPERATOR FAMILIES FROM OFF FARM SOURCES, 1959

	Total (\$ million)	Per Family
Commercial Farmers	\$180	\$1,691
Part-time Farmers	170	4,283
Part-retired Farmers	41	1,846
All Farmers	\$391	\$2,319

A special national survey in 1960 estimated the distribution of off-own-farm income by sources (Table 4).

It should be noted that proportionately fewer commercial farmers received income from off-farm sources than part-time farmers, but the percentage for commercial farmers was still quite significant (Table 5).

As a word of caution, these national data are sample estimates with a chance of considerable error and they probably do not apply precisely to Missouri. However, it is obvious that there are some rather marked differences among commercial, part-time, and part-retirement farms as to sources and amounts of income.

In 1959, about 44 percent of Missouri farm operators did some work off their own farms for pay; 30 percent worked 100 or more days. In 1954, the same percentage of Missouri farm operators did some work off their farms and 26 percent worked 100 or more days. Since only 23 percent of Missouri farm operators were classified as "part-time," in 1959, it is clear that many *commercial* farmers did some off-farm work. In fact, 15 percent of Missouri's commercial farmers reported that they worked off their farms 100 days or more in 1959. While the percentage of "part-timers" declined as gross farm income rose, about 9 percent of the Class I farmers (gross income of \$40,000 or more) reported 100 days or more of off-farm work.

Of the 74,600 Missouri farmers who worked off their farms in 1959, 38,660 (or more than one-half) worked

TABLE 4 - INCOME OF U. S. FARM OPERATORS FROM SOURCES OTHER THAN THE FARM OPERATED, 1960^a

Source	Percent of Farm-Operator Families Reporting	Average Per Farm-Operator Family Reporting
Cash wages, salaries	44.7%	\$2,872
Nonfarm business or profession	9.7	3,567
Custom work	16.0	467
Rental of farm property to others	11.8	1,031
Rental of nonfarm property to others	4.1	1,012
Interest, dividends, and regular payments from trust funds	14.1	684
Roomers and boarders	0.8	472
Federal Social Security, pensions, retirement pay, veteran payments and annuities	16.8	1,090
Unemployment income, workmen's compensation, and old age assistance	3.3	564
Other (oil leases, soil bank, etc)	11.2	934

^aFrom Table 5, Vol. 5, Part 5, Census of Agriculture 1959.

TABLE 5 - OFF-FARM INCOME SOURCES BY ECONOMIC CLASS OF FARM, U.S., 1960

	Percent of Commercial Farms Reporting	Percent of Part-time Farms Reporting	Percent of Part-Retire- ment Farms Reporting
Any off-farm source	69.4%	99.6%	92.8%
Cash wages & salaries	36.4	82.5	23.3
Nonfarm business or profession	7.5	15.2	14.2
Custom work	16.8	19.6	2.6
Rental of farm property to others	10.2	12.1	23.6
Rental of nonfarm property to others	3.8	4.5	5.1
Interest, dividends & regular payments from trust funds	15.6	8.5	15.4
Federal Social Security, pensions, retirement pay, veteran payments and annuities	9.5	13.1	78.1
Unemployment income, workmen's compensation and old age assistance	1.8	7.4	6.0

Source: Vol. 5, Part 5, Census of Agriculture, 1959.

200 or more days. Therefore, the total amount of off-farm work done and income received was substantial. In 1959, about 68,000 Missouri farmers had gross off-farm incomes larger than their gross sales of agricultural products. About 48,000 of these 68,000 farmers worked off

their farms. To put it another way, about two-thirds of those farmers who reported off-farm work also had off-farm incomes in excess of gross sales, while only one-fifth of those who did not report off-farm work had off-farm incomes in excess of gross sales (Table 6).

TABLE 6 - OFF-FARM WORK AND INCOME, MISSOURI, 1959

	Full <u>Owners</u>	Part <u>Owners</u>	<u>Tenants</u>	All Farm <u>Operators^a</u>
No. Operators Reporting ing Off-Farm Work	48,132	15,499	10,871	74,592
% of Such Operators with Off-Farm Income Exceeding Value of Agricultural Sales ^b	75.1	41.2	51.5	65.0
No. Operators Not Reporting Off-Farm Work	58,027	22,197	13,568	94,087
% of Such Operators with Off-Farm Income Exceeding Value of Agricul- tural Sales ^b	30.5	6.2	8.7	21.4

^aIncludes 385 managers as well as the three tenure groups listed.

^bPercentage computed on the basis of those reporting and omitting the 10% or so of farmers who didn't report on off-farm income.

The popular image in some circles is of a farmer commuting 50 miles to a big city factory. While there are many such farmers, many more of them work in neighboring towns or in other rural jobs. As indicated in

Table 7, there were almost 30,000 farmers in 1959 who lived in "outstate" Missouri and yet worked 100 days or more off their own farms.

TABLE 7 - FARM OPERATORS WORKING OFF-FARM 100 DAYS OR MORE IN 1954 AND 1959

	Number Operators		Percentage of All Farm Operators	
	1954	1959	1954	1959
MISSOURI	51,602	50,148	25.6	29.7
"Outstate" Mo. *	30,396	29,623	23.9	27.9
Three Suburban Areas*	21,206	20,525	28.5	32.8
St. Louis	3,952	3,612	33.0	36.5
Springfield	9,297	9,619	29.4	36.7
Kansas City-St. Joseph	7,957	7,294	25.7	27.6

*"Suburban Areas" are defined for this table as counties within 50 miles of the four major cities listed. Counties with one-half or more of their area within the 50 mile radius are included. "Outstate" Missouri includes the rest of the state.

Another Look At Farm Income

Gross farm income includes cash receipts from marketings, government payments, the value of home produced and consumed items, and the gross rental value of the family dwelling. Cash receipts deserve special attention because they are about seven-eighths of gross farm income.

TABLE 8 - MISSOURI CASH RECEIPTS

	Annual Averages (\$ million)		
	1948-51	1958-61	\$ Change
Livestock & Products	806	738	-68
Crops	265	357	+92
Dairy Products	132	124	- 8
Cattle & calves	267	301	+34
Hogs	260	218	-42
Eggs	74	41	-33
Turkeys	10	16	+ 6
Broilers*	34	19	-15
Sheep, lambs & wool	24	12	-12
Cotton	68	67	- 1
Soybeans	48	102	+54
Corn	47	68	+21
Wheat	44	64	+20

Source: Farm Income Situations

*Includes farm chickens 1948-51 as broilers had not yet been classified separately.

Crops have increased in Missouri as a source of cash receipts, both in terms of dollars received and relative to national cash receipts from crop sales. Livestock have de-

clined in Missouri in importance, both in terms of dollars received and relative to the national cash receipts from livestock sales.

The cash receipts from soybeans, corn, and wheat had increased considerably in Missouri in 1958-61 over 1948-51, while those from cotton remained constant.

Cash receipts from animal and poultry species have declined, with the exception of those from cattle and calves and turkeys.

TABLE 9 - MISSOURI CASH RECEIPTS AS PERCENT OF U.S. CASH RECEIPTS

	1948-51	1958-61	Direction of Change
Livestock & Products	4.72%	3.86%	-
Crops	2.05	2.41	+
Dairy products	3.25	2.63	-
Cattle & calves	4.70	3.99	-
Hogs	7.35	7.14	-
Eggs	4.03	2.44	-
Turkeys	3.54	4.72	+
Broilers*	3.47	1.86	-
Sheep, lambs & wool	4.20	2.81	-
Cotton	2.62	2.80	+
Soybeans	8.06	8.84	+
Corn	3.83	4.31	+
Wheat	2.18	2.95	+

Source: Farm Income Situations

*Includes farm chickens 1948-51 as broilers had not yet been classified separately.

The cash receipts from all livestock and poultry products in Missouri have declined relative to national sales with the one exception of turkeys.

Missouri's decline stems from very large declines in chickens and eggs—declines which are not likely to be repeated—and the failure of cattle feeders to keep up with the fast national growth in that industry.

The cash receipts from each of the four major cash crops in Missouri has increased relative to national sales.

Missouri is slowly becoming more specialized in the production of its most important product, cattle and calves. As a percentage of all farm cash receipts, cattle and calves have moved from 22.8 percent in 1944 to 25.2 percent in 1949-51 to 27.4 percent in 1958-61. However, Arizona moved from 21.2 percent in 1944 (less than Missouri) to 30.4 percent in 1961; California moved from 6.8 percent in 1944 to 16.7 percent in 1961; Colorado moved from 25.7 percent in 1944 to 48.1 percent in 1961.

A recent USDA estimate indicates that Missouri feeders are just barely producing more fed beef than is

TABLE 10 - PERCENTAGE OF ALL CASH RECEIPTS FROM CATTLE AND CALVES

	1949-51	1958-61
Colorado	42.7%	47.0
Nebraska	38.9	42.6
Iowa	29.1	36.7
Kansas	37.6	36.2
MISSOURI	25.2	27.4
Minnesota	20.1	25.0
United States	20.2	22.4

consumed in Missouri (cited in *National Provisioner*, Aug. 24, 1963). Missouri produced in 1962 about one-fourth as much fed beef as Nebraska, one-sixth as much as Iowa, less than Kansas and about the same amount as South Dakota.

Value of Harvested Crops

Data on cash receipts greatly underestimates the contribution of crops to the farm economy. The production values of feed grains and hay greatly exceed actual cash receipts since they are utilized mainly on the farms where they are produced.

TABLE 11 - TOTAL VALUE OF PRINCIPAL HARVESTED CROPS

	Annual Avg. 1949-51 (\$ Million)	Annual Avg. 1959-61 (\$ Million)	1959-61 as % 1949-51
MISSOURI	592	622	105%
United States	18,520	19,341	104
Iowa	1,188	1,179	99
Illinois	1,285	1,258	98
Minnesota	794	774	97
Nebraska	667	681	102
Kansas	652	789	121

Source: Agricultural Statistics

The total value of principal harvested crops rose sharply in the past decade in Kansas, rose slightly in Missouri, Nebraska, and the nation, and fell slightly in several neighboring states. Annual values for a single state fluctuate considerably, so that great significance should not be attached to small differences in percentages.

Missouri's annual total value of harvested crops

ranged from a low of \$490 million in 1954 to \$660 million in 1956.

The value of crop production runs from \$200 million to \$300 million more than crop sales in Missouri. The value of crops produced has approached within \$100 million of the value of livestock sales.

Missouri's slowly rising total value of harvested crops has been harvested from a slowly declining acreage.

TABLE 12 - ACRES HARVESTED CROPLAND

	Annual Average (000 acres)		
	1949-51	1959-61	1959-61 as % of 1949-51
MISSOURI	12,773	12,283	96.2%
United States	343,084	311,661	90.8
Iowa	22,391	22,360	99.9
Illinois	20,687	20,727	100.2
Minnesota	19,439	18,931	97.4
Nebraska	19,426	18,019	92.8
Kansas	21,307	20,976	98.4

Source: Various issues of Agricultural Statistics

Missouri's acreage of harvested cropland has not fallen nearly as rapidly as the nation's in the 1949-61 period. However, there has been a decline in Missouri while there has been none in Iowa and Illinois.

The average value of crops per acre has slowly risen for the nation and for Missouri, but not for some of Missouri's neighbors.

TABLE 13 - VALUE OF PRINCIPAL HARVESTED CROPS PER ACRE HARVESTED CROPLAND

	Annual Averages		\$ Change
	1949-51	1959-61	
MISSOURI	\$46	\$51	+5
United States	54	62	+8
Iowa	53	53	0
Illinois	62	61	-1
Minnesota	41	41	0
Nebraska	34	38	+4
Kansas	31	38	+7

Source: Computed from Agricultural Statistics

In recent years, Missouri's average value per acre of principal harvested crops has approached that of Iowa. While the Missouri value per acre exceeds the averages

for Minnesota, Nebraska, and Kansas, it is below the national average.

While average values per acre of crop production have risen, the net farm income per acre of harvested cropland has slowly fallen for Missouri and the nation. Though gross farm income per acre has risen about 12 percent for Missouri and 31 percent for the U. S., the nets have fallen. Average net farm income per acre harvested is the same in Missouri as in the nation and exceeds the averages of several neighboring states.

TABLE 14 - TOTAL NET FARM INCOME PER ACRE HARVESTED CROPLAND

	1949-51	1959-61	Change in Decade
MISSOURI	\$43	\$38	\$-5
United States	42	39	-3
Iowa	42	32	-10
Illinois	37	29	-8
Minnesota	29	26	-3
Nebraska	23	20	-3

Value of Major Crops

A decade ago (1950-52), the ranking in total value of the major crops in Missouri was: feed grains, hay, soybeans, cotton, and wheat. The feed grains were far in the lead. Now (1960-63) soybeans have replaced hay in second place and are coming much closer to the value of corn and grain sorghums (Table 15).

Soybeans have been the postwar "growth crop" of Missouri and the nation. Missouri has more than held its own in this growing market. The phenomenal increase in value is a result of rising production and, since 1959, rising prices. Rising production is a result of rapidly increasing acreage and slowly increasing yields. Missouri's

harvested acreage of soybeans jumped from about 1.2 million acres in 1950 to 1.8 million in 1953, and jumped again from 1.6 million in 1957 to 2.7 million acres in 1963. Missouri's yields per harvested acre have risen from 21.3 bushels in 1949-51 to 22.7 bushels in 1960-63. Recent yield increases are not nearly as impressive as the increases in the late 1940's; the 1939-48 average was 15.0 bushels.

Acreages of all four major crops—corn, soybeans, cotton, and wheat—have been affected directly or indirectly in recent years by federal farm programs.

TABLE 15 - VALUE* OF MAJOR CROPS IN MISSOURI

	<u>Corn & Grain Sorghum</u>	<u>Soybeans</u>	<u>Hay</u>	<u>Cotton & Cottonseed</u>	<u>Wheat</u>
	(\$ Million)				
1949	193	40	79	69	53
1950	261	65	84	50	48
1951	234	69	108	55	47
1952	260	86	98	68	57
1953	207	66	68	73	79
1954	129	66	76	76	84
1955	221	71	77	67	94
1956	256	78	76	69	97
1957	190	77	86	27	73
1958	221	110	84	48	69
1959	256	97	75	82	65
1960	239	102	84	80	65
1961	206	142	94	71	75
1962	204	142	94	84	52
1963	244	171	97	84	72

Note: The 1963 estimates and some of the 1962 estimates are preliminary. Sources: Field and Seed Crops Bulletins 208 and 311, Annual Summaries of Crop Production; Crop Values, Dec. 18, 1963 and other USDA reports.

*Effects of government programs on market price are reflected here, but direct payments for diverted acres, etc. are not included.

Appendix

TABLE 16 - GROSS VALUE OF PRODUCTION PER ACRE HARVESTED, MISSOURI

	<u>Corn</u>	<u>Soybeans</u>	<u>Cotton & Cottonseed</u>	<u>Wheat</u>
1950-52	\$62	\$53	\$126	\$35
1955-57	55	41	150*	55
1960-62	59	51	199	52

*Reduced by the very poor 1957 season.

Source: Same as Table 15

TABLE 17 - AVERAGE ACREAGE HARVESTED (000 ACRES), MISSOURI

	<u>Corn</u>	<u>Soybeans</u>	<u>Cotton & Cottonseed</u>	<u>Wheat</u>
1951-53	4,062	1,613	444	1,365
1956-58	3,535	1,908	318	1,583
1961-63	3,343	2,694	370	1,193

Source: Same as Table 15.

MISSOURI FARM INCOME

	<u>Total Farm Income</u> (\$ million)		<u>Farm Income Per Farm</u>	
	Gross	Net	Gross	Net
1949	1,111.9	497.8	4,557	2,040
1950	1,148.8	569.6	4,747	2,354
1951	1,313.3	577.5	5,518	2,426
1952	1,220.4	481.7	5,497	2,170
1953	1,177.1	415.2	5,553	1,958
1954	1,125.0	437.7	5,515	2,146
1955	1,072.1	483.4	5,360	2,417
1956	1,174.6	451.8	5,993	2,305
1957	1,185.3	438.8	6,174	2,285
1958	1,238.9	509.8	6,590	2,712
1959	1,269.0	454.3	6,897	2,469
1960	1,270.0	443.8	7,056	2,466
1961	1,307.7	486.2	7,472	2,778
1962	1,384.7	505.4	8,145	2,973

Source: Farm Income 1949-62--State Estimates, FIS-191
Supplement, August 1963.

This bulletin is a report of Dept. of Agricultural Economics Research Project 428, Agricultural Development Trends.