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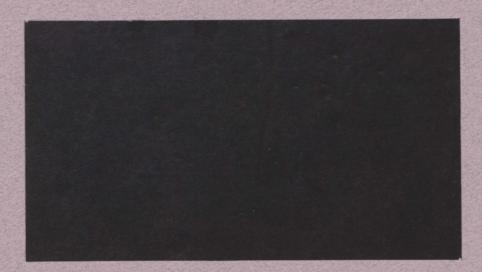
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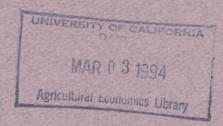
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SMALL, MEDIUM AND LARGE FARMS IN THE NORTH CENTRAL REGION: A STATISTICAL PROFILE

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Extension specialists are often challenged to design programs that meet the needs of certain classes of farmers, such as small, medium or large-scale operators. The purpose of this paper is to summarize and compare characteristics of three size groups of farms in the North Central Region, as background for a thorough discussion of how extension specialists can meet the needs of each of these groups.

DEFINITION OF FARM SIZE

Farm size can be measured in many ways. For farms producing the same product in a homogeneous area, number of acres or number of livestock is a common measure. When comparing across all farms in a large region a broader definition is needed. The three farm size task force groups formed by the North Central Regional Farm Management Extension Committee agreed to use total market value of agricultural products sold as a measure of farm size. The 1987 Census of Agriculture reports many farm characteristics by the market value of products sold, in categories from less than \$2,500 to over \$1 million dollars.

Prepared for presentation at the annual meeting of the American Agricultural Economics Association, August 10, 1992, Baltimore, Maryland.

Given that returns to labor in agriculture typically range from 15 to 20 percent of gross income, the minimum level of gross farm income needed to earn an average U.S. wage rate for full-time employment is about \$100,000. A small farm, therefore, was defined as any operation which will likely generate less than the minimum income needed to support a full-time equivalent worker, or a farm with gross sales less than \$100,000. A large farm is one that will likely generate earnings that will support several family members and/or hired employees. The break between a medium and large farm was set at \$500,000 of gross sales. Farms with \$100,000 to \$500,000 of gross sales were placed in the medium category.

CHARACTERISTICS OF SMALL, MEDIUM AND LARGE FARMS

Using the Census of Agriculture definition of a farm, a unit with \$1,000 or more gross sales, the large majority of North Central farms (82.7 percent) are classed as small operations (Table 1). Although the small farms averaged only 277 acres in size, they controlled 56 percent of the agricultural land in the North Central Region. These small farms averaged \$24,595 in receipts per farm and accounted for 30 percent of the total agricultural sales in 1987.

At the other extreme in size, the 9,560 farms that grossed over one-half million dollars per farm are only 1.1 percent of the total number of farms, but sold one-fourth of all products, with average receipts of nearly 1.5 million dollars per farm. Large farms controlled nearly six percent of the farmland.

Forty-five percent of the agricultural sales came from medium sized farms. These farms are 16 percent of the total and operate 38 percent of the farmland. Average sales per medium farm were \$185,816.

SOURCES OF INCOME

As expected, net cash income per farm varied directly with total sales. The net cash income on large farms was \$279,433 per farm, but dropped to \$9,059 on the smallest farms (Table 4). Data in Table 5 indicate that small farms received more of their net cash income from government payments (44.1 percent) and other farm income (8.6 percent) than medium and large farms did.

Large farms had smaller profit margins per dollar of sales. Net cash income as a percent of total sales was only 18.8 percent on large farms, compared to 39.6 percent on farms grossing between \$100,000 and \$500,000, and 36.8 percent on the smallest farms. The percent of small farms with positive net cash returns was only 57 percent, however, compared to about 89 to 91 percent on the medium and large farms (Table 5).

On a regional basis, large farms received a much higher proportion of their cash sales from livestock (over 81 percent) than the medium and small farms did. Overall, 58.3 percent of the sales come from livestock. Evidently large scale enterprises are more competitive or at least more feasible for livestock than for crops. Nearly 70 percent of the large farms' livestock sales come from cattle. Most of the poultry sales also come from large farms. For medium farms cattle, hogs and dairy were about equally important.

Within the mix of crop sales, over 90 percent of the small and medium farms' sales were from grain. Large farms, on the other hand, had over 27 percent of their crop sales from horticultural crops, such as fruits, vegetables and ornamentals.

LAND TENURE AND USE

Of the 350 million acres of land in farms in the North Central Region, 60 percent is owned by the operating farmers and the rest is leased. All farm sizes operated substantial proportions

of both owned and rented land. Small farm operators owned the highest proportion of their land, nearly 69 percent (Table 9). Medium farms leased the highest proportion, 54 percent. The average small farm operated 277 acres of owned and rented land compared to the regional average of 407 acres. All three farm sizes had an average of 51 to 58 percent of their land in harvested cropland (Table 10). However, small farms tended to have more of their land in pasture and woodlots, and large farms had relatively more land in range land.

PRODUCTIVITY AND EXPENSES

Productivity apparently decreases as farm size decreases (Table 11). Grain yields for corn, wheat and soybeans dropped 20-30 percent from large farms to small farms (Table 11). Dollars of dairy products sold per cow also decreased, from \$1,833 on large farms to \$1,248 on farms grossing less than \$100,000 in the North Central Region. Possible explanations are lower quality land, poorer management, or less capital investment.

Commercial fertilizer expenditure per cropland acre decreased from \$22.63 on large farms to only \$10.89 on the smallest farms (Table 12). The proportion of cropland receiving commercial fertilizer also dropped, from 63 to 44 percent as farm size decreased. Agricultural chemical (pesticide) expenditures per cropland acre dropped from \$14.69 on large farms to \$6.74 on the smallest farms, and the percent of cropland treated dropped from 52 percent on the large farms to 38 percent on the small farms. This may be related to the fact that the small farms depended more on hay and other crops and less on horticultural crops, although the proportion of land in grain production was about the same for all farms. Smaller farms may be substituting more animal manure and pest control labor for purchased fertilizer and pesticides.

Total farm expenses averaged over \$1.2 million per farm for the large farms, compared to only \$20,312 for the small farms (Table 13). The mix of expenditures differed among size

groups. Only one-third of the small farms had any hired labor expense, and it accounted for less than three percent of the total expense. Only half the small farms had interest expense, compared to 85 and 92 percent of the medium and large farms, so we can infer that small farm operators are more likely to use only family labor and equity capital.

AGE AND EMPLOYMENT STATUS

Small farm operators tend to be older than other farmers -- over 21 percent of them are over 65 (Table 14). Large farmers were over 65 more often than medium farmers, however, 11.2 percent versus 7.4 percent. Only 56.7 percent of the small farmers reported that farming was their primary occupation. No doubt many had substantial off-farm employment. Less than 8 percent of the medium and large farmers had a nonfarm occupation.

Off-farm work was much more common for the small farmers than for the medium or large operators. Only 42 percent of the small farmer group reported having no off-farm employment, and over 38 percent worked more than 200 days away from the farm (Table 15). This has implications for financial and labor management, as well as for program delivery methods.

The USDA and the Department of Commerce publish an annual estimate of the occupations and industries of employed persons 15 years of age and over who live on farms (Table 16). In the North Central states, 677,000 farm residents work in farm occupations, 511,000 as farm operators or managers and 166,000 as farm workers. This is only half of all farm residents (Table 17). However, data in Table 19 indicate that nearly 73 percent of midwest farm households had some income from farm self-employment.

SUMMARY

Farm operators differ substantially in their resources, sources of income and personal characteristics. Some general conclusions can be drawn about these characteristics by grouping farmers by their total agricultural sales. Extension specialists can use this information to design programs targeted to the specific needs and habits of their farmer audiences.

Table 1. Number of Farms by Farm Size

		Annual S	Sales			Annua	al Sales	
Farms	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Percent of Total Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	105,180	1,630	25,157	78,393	lowa	1.5%	23.9%	74.5%
Illinois	88,786	1,059	18,588	69,139	Illinois	1.2%	20.9%	77.9%
Indiana	70,506	827	10,126	59,553	Indiana	1.2%	14.4%	84.5%
Kansas	68,579	957	8,422	59,200	Kansas	1.4%	12.3%	86.39
Michigan	51,172	588	5,808	44,776	Michigan	1.1%	11.3%	87.5%
Minnesota	85,079	860	15,546	68,673	Minnesota	1.0%	18.3%	80.79
Missouri	106,105	493	8,399	97,213	Missouri	0.5%	7.9%	91.69
North Dakota	35,289	246	5,701	29,342	North Dakota	0.7%	16.2%	83.19
Nebraska	60,502	1,279	12,700	46,523	Nebraska	2.1%	21.0%	76.99
Ohio	79,277	570	7,971	70,736	Ohio	0.7%	10.1%	89.29
South Dakota	36,376	444	6,338	29,594	South Dakota	1.2%	17.4%	81.49
Wisconsin	75,131	607	14,750	59,774	Wisconsin	0.8%	19.6%	79.69
N.C. REGION	861,982	9,560	139,506	712,916	N.C. REGION	1.1%	16.2%	82.79
Kentucky	92,453	249	3,298	88,906	Kentucky	0.3%	3.6%	96.29
Oklahoma	70,228	465	4,606	65,157	Oklahoma	0.7%	6.6%	92.89
United States	2,087,759	32,023	263,698	1,792,038	United States	1.5%	12.6%	85.89

Table 2. Land in Farms, by Farm Size

		Annual S	Sales			Annu	al Sales			
	All	\$500,000	\$100,000-	Less Than	Percent of	\$500,000	\$100,000-	Less Than		
1,000 Acres	Farms	or More	\$499,999	\$100,000	Total Acres	or More	\$499,999	\$100,000		
lowa	31,638	1,574	14,504	15,561	lowa	5.0%	45.8%	49.2%		
Illinois	28,527	1,506	14,031	12,990	Illinois	5.3%	49.2%	45.5%		
Indiana	16,171	947	6,973	8,251	Indiana	5.9%	43.1%	51.0%		
Kansas	46,629	3,504	16,225	26,899	Kansas	7.5%	34.8%	57.7%		
Michigan	10,317	729	3,533	6,054	Michigan	7.1%	34.2%	58.7%		
Minnesota	26,574	1,151	10,396	15,027	Minnesota	4.3%	39.1%	56.5%		
Missouri	29,209	887	7,701	20,621	Missouri	3.0%	26.4%	70.6%		
North Dakota	40,337	1,037	12,780	26,520	North Dakota	2.6%	31.7%	65.7%		
Nebraska	45,305	5,040	19,536	20,729	Nebraska	11.1%	43.1%	45.8%		
Ohio	14,997	555	5,010	9,432	Ohio	3.7%	33.4%	62.9%		
South Dakota	44,158	2,512	15,489	26,156	South Dakota	5.7%	35.1%	59.2%		
Wisconsin	16,607	733	6,325	9,549	Wisconsin	4.4%	38.1%	57.5%		
N.C. REGION	350,468	20,176	132,502	197,789	N.C. REGION	5.8%	37.8%	56.4%		
Kentucky	14,013	367	2,398	11,249	Kentucky	2.6%	17.1%	80.3%		
Oklahoma	31,542	1,918	8,208	21,416	Oklahoma	6.1%	26.0%	67.9%		
United States	964,471	125,552	338,648	500,271	United States	13.0%	35.1%	51.9%		

Table 3. Annual Sales of Farm Products, by Farm Size

		Annual S	Sales			Annua	al Sales	
	All	\$500,000	\$100,000-	Less Than	Percent of	\$500,000	\$100,000-	Less Than
\$1,000	Farms	or More	\$499,999	\$100,000	Total Sales	or More	\$499,999	\$100,000
lowa	\$8,926,799	\$1,643,439	\$4,762.571	\$2,520,790	lowa	18.4%	53.4%	28.2%
Illinois	6,376,801	977,954	3,498,681	1,900,166	Illinois	15.3%	54.9%	29.8%
Indiana	4,067,684	878,186	1,984,372	1,205,124	Indiana	21.6%	48.8%	29.6%
Kansas	6,476,669	3,533,796	1,603,737	1,339,134	Kansas	54.6%	24.8%	20.7%
Michigan	2,545,078	666,271	1,165,750	713,057	Michigan	26.2%	45.8%	28.0%
Minnesota	5,676,376	¹³ 952,064	2,821,283	1,903,029	Minnesota	16.8%	49.7%	33.5%
Missouri	3,644,988	510,675	1,564,877	1,569,436	Missouri	14.0%	42.9%	43.1%
North Dakota	2,188,158	213,184	994,054	980,920	North Dakota	9.7%	45.4%	44.8%
Nebraska	6,667,132	2,829,150	2,393,334	1,444,649	Nebraska	42.4%	35.9%	21.7%
Ohio	3,434,064	691,522	1,499,403	1,243,138	Ohio	20.1%	43.7%	36.2%
South Dakota	2,719,498	638,663	1,125,703	955,132	South Dakota	23.5%	41.4%	35.1%
Wisconsin	4,909,869	641,746	2,508,638	1,759,484	Wisconsin	13.1%	51.1%	-35.8%
N.C. REGION	57,633,116	14,176,650	25,922,403	17,534,059	N.C. REGION	24.6%	45.0%	30.4%
Kentucky	2,075,571	373,622	613,092	1,088,855	Kentucky	18.0%	29.5%	52.5%
Oklahoma	2,714,892	899,522	932,213	883,158	Oklahoma	33.1%	34.3%	32.5%
United States	136,048,516	51,952,279	51,917,924	32,178,313	United States	38.2%	38.2%	23.7%

Table 4. Average Acres and Sales per Farm

Farms or More \$499,999 \$100,000 \$1,000 Farms or More \$499,999 \$	ss Than 00,000
Farms or More \$499,999 \$100,000 \$1,000 Farms or More \$499,999 \$100,000 Farms or More \$499,999 F	00,000 \$32,156
lowa 301 965 577 198 lowa \$84,872 \$1,008,245 \$189,314	\$32,156
Illinois 321 1,422 755 188 Illinois 71,822 923,469 188,223	
	27,483
Indiana 229 1,145 689 139 Indiana 57,693 1,061,894 195,968	20,236
Kansas 680 3,662 1,927 454 Kansas 94,441 3,692,576 190,422	22.621
Michigan 202 1,240 608 135 Michigan 49,736 1,133,114 200,715	15,925
Minnesota 312 1,339 669 219 Minnesota 66,719 1,107,051 181,480	27,711
Missouri 275 1,800 917 212 Missouri 34,353 1,035,853 186,317	16,144
North Dakota 1,143 4,217 2,242 904 North Dakota 62,007 866,602 174,365	33,431
Nebraska 749 3,941 1,538 446 Nebraska 110,197 2,212,001 188,451	31,052
Ohio 189 974 629 133 Ohio 43,317 1,213,197 188,107	17,574
South Dakota 1,214 5,658 2,444 884 South Dakota 74,761 1,438,431 177,612	32,275
Wisconsin 221 1,207 429 160 Wisconsin 65,351 1,057,242 170,077	29,436
N.C. REGION 407 2,110 950 277 N.C. REGION 66,861 1,482,913 185,816	24,595
Kentucky 152 1,472 727 127 Kentucky 22,450 1,500,490 185,898	12,247
Oklahoma 449 4,124 1,782 329 Oklahoma 38,658 1,934,456 202,391	13,554
United States 462 3,921 1,284 279 United States 65,165 1,622,343 196,884	17,956

Table 5. Sources of Cash Income per Farm, by Farm Size

				-					
		Annual Sa	ales				Annual Sa	iles	
					-				
Net Cash					Net Cash Return			Service Services	
Return	All	\$500,000	\$100,000-	Less Than	as % of Total	All	\$500,000	\$100,000-	Less Than
per Farm	Farms	or More	\$499,999	\$100,000	Net Cash Income	Farms	or More	\$499,999	\$100,000
lowa	\$20,412	\$187,264	\$52,328	\$6,763	lowa	62.5%	81.1%	67.4%	47.7%
Illinois	19,495	222,912	58,393	6,045	Illinois	63.9%	77.9%	67.0%	52.3%
Indiana	12,533	209,358	50,724	3,297	Indiana	63.8%	83.0%	66.7%	48.5%
Kansas	13,447	401,343	43,052	3,051	Kansas	58.9 %	90.3%	58.9%	33.9%
Michigan	6,252	179,854	39,968	(385)	Michigan	55.1%	80.5%	66.6%	-16.9%
Minnesota	14,503	198,933	46,329	5,073	Minnesota	60.7%	83.5%	65.7%	47.1%
Missouri	7,821	207,560	53,191	2,912	Missouri	70.5%	87.2%	. 75.9%	59.8%
North Dakota	9,426	158,907	34,925	3,318	North Dakota	38.4%	70.2%	49.2%	23.7%
Nebraska	20,314	260,409	49,231	6,029	Nebraska	60.5%	85.3%	61.5%	43.9%
Ohio	8,645	239,937	47,008	2,544	Ohio	66.6%	87.7%	70.7%	51.1%
South Dakota	15,779	239,074	46,166	5,947	South Dakota	61.8%	81.1%	67.3%	48.4%
Wisconsin	16,685	253,227	49,063	6,387	Wisconsin	79.9%	89.9%	82.4%	72.4%
N.C. REGION	14,086	234,986	49,415	4,286	N.C. REGION	62.9%	84.1%	67.2%	47.3%
Kentucky	6,270	424,928	55,850	3,279	Kentucky	79.2%	93.6%	79.3%	74.9%
Oklahoma	4,214	251,510	38,329	267	Oklahoma	53.7%	90,1%	66.1%	9.9%
United States	12,660	298,100	49,468	2,318	United States	69.5%	90.1%	71.0%	43.8%

		Annual S	ales			Annual Sales				
Other					Other Farm Income)				
Farm Income	All	\$500,000	\$100,000-	Less Than	as % of Total	All	\$500,000	\$100,000-	Less Than	
per Farm	Farms	or More	\$499,999	\$100,000	Net Cash Income	Farms	or More	\$499,999	\$100,000	
lowa	\$1,255	\$2,707	\$1,867	\$1,029	· Iowa	3.8%	1.2%	2.4%	7.3%	
Illinois	1,052	3,711	1,812	809	Illinois	3.4%	1.3%	2.1%	7.0%	
Indiana	848	2,568	1,631	691	Indiana	4.3%	1.0%	2.1%	10.2%	
Kansas	1,020	4,054	2,042	828	Kansas	4.5%	0.9%	2.8%	9.2%	
Michigan	725	3,633	1,805	547	Michigan	6.4%	1.6%	3.0%	24.1%	
Minnesota	1,023	3,537	1,832	811	Minnesota	4.3%	1.5%	2.6%	7.5%	
Missouri	657	3,371	2,056	524	Missouri	5.9%	1.4%	2.9%	10.7%	
North Dakota	1,393	6,098	2,090	1,221	North Dakota	5.7%	2.7%	2.9%	8.7%	
Nebraska	1,377	3,761	2,115	1,115	Nebraska	4.1%	1.2%	2.6%	8.1%	
Ohio	731	2,860	1,636	614	Ohio	5.6%	1.0%	2.5%	12.3%	
South Dakota	1,140	5,360	1,799	936	South Dakota	4.5%	1.8%	2.6%	7.6%	
Wisconsin	789	3,127	1,272	648	Wisconsin	3.8%	1.1%	2.1%	6 7.3%	
N.C. REGION	975	3,494	1,810	779	N.C. REGION	4.4%	1.3%	2.5%	8.6%	
Kentucky	564	2,365	1,339	530	Kentucky	7.1%	0.5%	1.9%	6 12.1%	
Oklahoma	627	7,794	1,865	497	Oklahoma	8.0%	2.8%	3.2%	6 18.4%	
United States	930	5,085	2,044	697	United States	5.1%	1.5%	2.9%	6 13.2%	

Table 5. Sources of Cash Income per Farm, by Farm Size (continued)

		Annual S	aies		Annual Sales							
Government Payments per Farm	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Govt. Payments as % of Total Net Cash Income	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000			
lowa	\$10,969	\$41,074	\$23,386	\$6,381	lowa	33.6%	17.8%	30.1%	45.0%			
Illinois	9,973	59,562	26,947	4,702	Illinois	32.7%	20.8%	30.9%	40.7%			
Indiana	6,249	40,417	23,650	2,812	Indiana	31.8%	16.0%	31.1%	41.3%			
Kansas	8,365	38,866	28,022	5,124	Kansas	36.6%	8.7%	38.3%	56.9%			
Michigan	4,367	39,912	18,204	2,111	Michigan	38.5%	17.9%	30.4%	92.9%			
Minnesota	8,379	35,898	22,404	4,895	Minnesota	35.1%	15.1%	31.7%	45.4%			
Missouri	2,613	27,002	14,865	1,437	Missouri	23.6%	11.3%	21.2%	29.5%			
North Dakota	13,731	61,407	33,983	9,474	North Dakota	55.9%	27.1%	47.9%	67.6%			
Nebraska	11,871	41,285	28,677	6,582	Nebraska	35.4%	13.5%	35.8%	48.0%			
Ohio	3,612	30,932	17,850	1,818	Ohio	27.8%	11.3%	26.8%	36.5%			
South Dakota	8,607	50,392	20,630	5,415	South Dakota	33.7%	17.1%	30.1%	44.0%			
Wisconsin	3,419	25,196	9,227	1,781	Wisconsin	16.4%	8.9%	15.5%	20.2%			
N.C. REGION	7,339	40,953	22,288	3,994	N.C. REGION	32.8%	14.7%	30.3%	44.1%			
Kentucky	1,086	26,534	13,199	570	Kentucky	13.7%	5.8%	18.8%	13.0%			
Oklahoma	3,007	19,985	17,807	1,935	Oklahoma	38.3%	7.2%	30.7%	71.7%			
United States	4,621	27,618	18,196	2,271	United States	25.4%	8.3%	26.1%	43.0%			

		Annual S	ales			les			
Total Net					Net Cash Income				
Cash Income	All	\$500,000	\$100,000-	Less Than	as % of Total	All	\$500,000	\$100,000-	Less Than
per Farm	Farms	or More	\$ 499,999	\$100,000	Farm Sales	Farms	or More	\$499,999	\$100,000
lowa	\$32,635	\$231,045	\$77,581	\$14,173	lowa	38.5%	22.9%	41.0%	44.1%
Illinois	30,519	286,185	87,152	11,556	Illinois	42.5%	31.0%	46.3%	42.0%
Indiana	19,630	252,343	76,005	6,800	Indiana	34.0%	23.8%	38.8%	33.6%
Kansas	22,832	444,263	73,116	9,002	Kansas	24.2%	12.0%	38.4%	39.8%
Michigan	11,344	223,398	59,976	2,273	Michigan	22.8%	19.7%	29.9%	14.3%
Minnesota	23,905	238,367	70,565	10,778	Minnesota	35.8%	21.5%	38.9%	38.9%
Missouri	11,091	237,933	70,112	4,873	Missouri	32.3%	23.0%	37.6%	30.2%
North Dakota	24,549	226,411	70,997	14,013	North Dakota	39.6%	26.1%	40.7%	41.9%
Nebraska	33,562	305,455	80,023	13,727	Nebraska	30.5%	13.8%	42.5%	44.2%
Ohio	12,988	273,728	66,494	4,976	Ohio	30.0%	22.6 %	35.3%	28.3%
South Dakota	25,526	294,827	68,5 95	12,298	South Dakota	34.1%	20.5%	38.6%	38.1%
Wisconsin	20,894	281,550	59,562	8,816	Wisconsin	32.0%	26.6 %	35.0%	30.0%
N.C. REGION	22,400	279,433	73,514	9,059	N.C. REGION	33.5%	18.8%	39.6%	36.8%
Kentucky	7,919	453,827	70,389	4,379	Kentucky	35.3%	30.2%	37.9%	35.8%
Oklahoma	7,847	279,288	58,002	2,699	Oklahoma	20.3%	14.4%	28.7%	6 19.9%
United States	18,211	330,804	69,708	5,286	United States	27.9 %	20.4%	35.4%	6 29.4%

Table 6. Total Crop and Livestock Sales, by Farm Size

	Ar	nnual Sales				An	nual Sales		
Total Crop Sales (\$million)	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Crops as % of Total Agr. Sales	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	\$3,653	\$227	\$1,959	\$1,465	lowa	40.9%	13.8%	41.1%	58.1%
Illinois	4,109	381	2,299	1,429	Illinois	64.4%	39.0%	65.7%	75.2%
Indiana	2,100	210	1,107	783	Indiana	51.6%	23.9%	55.8%	64.9%
Kansas	1,740	187	763	790	Kansas	26.9%	5.3%	47.5%	59.0%
Michigan	1,170	272	501	397	Michigan	46.0%	40.9%	43.0%	55.6%
Minnesota	2,442	237	1,269	936	Minnesota	43.0%	24.9%	45.0%	49.2%
Missouri	1,500	175	700	625	Missouri	41.1%	34.3%	44.7%	39.8%
· North Dakota	1,560	146	742	668	North Dakota	71.3%	68.4%	74.6%	68.1%
Nebraska	2,147	185	1,134	824	Nebraska	32.2%	6.6%	47.4%	57.0%
Ohio	1,667	226	706	735	Ohio	48.5%	32.7%	47.1%	59.1%
South Dakota	859	77	381	400	South Dakota	31.6%	12.0%	33.8%	41.9%
Wisconsin	900	246	375	279	Wisconsin	18.3%	38.4%	14.9%	15.9%
N.C. REGION	23,454	2,436	11,777	9,234	N.C. REGION	40.7%	17.2%	45.4%	52.7%
Kentucky	1,002	97	314	591	Kentucky	48.3%	26.0%	51.1%	54.3%
Oklahoma	1,027	253	399	374	Oklahoma	37.8%	28.1%	42.8%	42.4%
United States	50,033	13,794	21,112	15,128	United States	36.8%	26.6%	40.7%	47.0%

	. Ar	nual Sales				- An	nual Sales		
					Livestock as -				
Livestock Sales	All	\$500,000	\$100,000-	Less Than	% of Total	All	\$500,000	\$100,000-	Less Than
(\$million)	Farms	or More	\$499,999	\$100,000	Agr. Sales	Farms	or More	\$499,999	\$100,000
lowa	\$5,267	\$1,415	\$2,799	\$1,053	lowa	59.0%	86.1%	58.8%	41.8%
Illinois	2,218	576	1,181	461	Illinois	34.8%	58.9%	33.7%	24.2%
Indiana	1,941	657	867	417	Indiana	47.7%	74.8%	43.7%	34.6%
Kansas	4,783	3,367	859	557	Kansas	73.9%	95.3%	53.6%	41.6%
Michigan	1,272	354	624	295	Michigan	50.0%	53.1%	53.5%	41.4%
Minnesota	3,176	705	1,524	947	Minnesota	55.9%	74.0%	54.0%	49.7%
Missouri	2,184	377	850	957	Missouri	59.9%	73.9%	54.3%	61.0%
North Dakota	691	76	279	336	North Dakota	31.6%	35.9%	28.0%	34.2%
Nebraska	4,528	2,643	1,261	624	Nebraska	67.9%	93.4%	52.7%	43.2%
. Ohio	1,683	429	761	493	Ohio	49.0%	62.0%	50.8%	39.7%
. South Dakota	1,862	563	743	. 556	South Dakota	68.5%	88.2%	66.0%	58.2%
Wisconsin	3,973	389	2,121	1,463	Wisconsin	80.9%	60.7%	84.6%	83.1%
N.C. REGION	33,578	11,551	13,869	8,157	N.C. REGION	58.3%	81.5%	53.5%	46.5%
Kentucky	1,186	318	343	524	Kentucky	57.1%	85.2%	56.0%	48.1%
Oklahoma	2,105	819	687	600	Oklahoma	77.5%	91.0%	73.7%	67.9%
United States	77,117	33,262	27,851	16,005	United States	56.7%	64.0%	53.6%	49.7%

Table 7. Total Agricultural Sales from Crops, by Farm Size

 $(e_{i,k}) = e_{i,k} \cdot (e_{i,k}) = e_{i,k}^{(k)} \cdot (e_{i,k})^{(k)}$

	An	nual Sales				Orain as		Annual Sales	
			£100 000	Loce Then		Grain as - % of Total			
GRAIN	All	\$500,000 or More	\$100,000- \$499,999	\$100,000		Crop Sales			
(\$million)	Farms	01 M016							
lowa	\$3,563.3	\$202.2	\$1,927.4	\$1,433.7		lowa	lowa 97.6%	lowa 97.6% 89.0%	lowa 97.6% 89.0% 98.4%
Illinois	3,887.4	253.6	2,243.7	1,390.1		Illinois	Illinois 94.6%	Illinois 94.6% 66.5%	Illinois 94.6% 66.5% 97.6%
Indiana	1,964.3	159.5	1,068.8	735.9		Indiana	Indiana 93.5%	Indiana 93.5% 75.9%	
Kansas	1,550.4	121.5	695.7	733.2		Kansas	Kansas 89.1%	Kansas 89.1% 65.0%	Kansas 89.1% 65.0% 91.2%
Michigan	578.0	58.6	263.3	256.2		Michigan	Michigan 49.4%	Michigan 49.4% 21.5%	Michigan 49.4% 21.5% 52.5%
Minnesota	2,033.7	123.0	1,059.3	851.5		Minnesota	Minnesota 83.3%	Minnesota 83.3% 51.9%	Minnesota 83.3% 51.9% 83.5%
Missouri	1,219.2	80.5	607.8	531.0		Missouri	Missouri 81.3%	Missouri 81.3% 45.9%	Missouri 81.3% 45.9% 86.8%
North Dakota	1,273.5	60.3	599.4	613.8		North Dakota	North Dakota 81.6%	North Dakota 81.6% 41.4%	North Dakota 81.6% 41.4% 80.8%
	2,004.5	161.2	1,071,9	771.4		Nebraska	Nebraska 93.4%	Nebraska 93.4% 87.0%	Nebraska 93.4% 87.0% 94.5%
Nebraska	1,346.9	74.8	625.1	647.1		Ohio	Ohio 80.8%	Onio 80.8% 33.1%	Ohio 80.8% 33.1% 88.6%
- Ohio	780.3	59.9	355.8	364.7		South Dakota			
South Dakota		52.5	234.6	157.0		Visconsin			
Wisconsin	444.0	1,407.5	10,752.7	8,485.3	N.C. REGIO				
N.C. REGION	20,645.6	34.6	176.1	136.1	Kentucky				
Kentucky	346.8		139.5	186.2	Oklahoma				
Oklahoma	346.6	20.9		10,811.4	United States				
United States	28,340.5	2,764.7	14,764.4	10,011.4	United States				20.010
	A	nnual Sales				Α	ł	nnual Sales	nnual Sales
					Horticultural -				
HORTICULTURAL	_ All	\$500,000	\$100,000-	Less Than	as % of Total	All		\$500,000	
(\$million)	Farms	or More	\$499,999	\$100,000	Crop Sales	Farms		or More	or More \$499,999
lowa	\$41.1	\$21.1	\$13.5	\$6.4	lowa	1.1%	,	9.3%	9.3% 0.7%
Illinois		120.1	39.6	17.2	Illinois	4.3%	31	.5%	.5% 1.79
Indiana		43.1	26.2	15.4	Indiana	4.0%	20.5	٥,	% 2.49
Kansas		37.1	26.7	15.1	Kansas	4.5.%	19.99		6 3.59
Michigan	414.1	179.3	154.2	80.6	Michigan (35.4%	65.9%	•	6 30.79
Minnesota		28.1	27.0	13.4	Minnesota	2.8%	6 11.99	,	6 2.19
				40.6	Missouri	13.7%	51.59		ъ́ 10.7°
Missouri		11.2		24.7	North Dakota	4.3%	6 7.79		6 4.19
North Dakota				7.5	Nebraska	0.9%			6 0.79
Nebraska				35.6	Ohio	14.39			
Ohio					South Dakota	1.19			
South Dakota				2.7	Wisconsin	26.1%			
Wisconsin					N.C. REGION	5.3%			
N.C. REGION						15.19			
Kentucky					Kentucky				
Oklahoma	579.9	224.1			Oklanoma	56.59			
United States	12,866.5	7,927.1	3,248.4	1,691.0	United States	25.79	% 57.5°	70	15.4

Table 8. Total Agricultural Sales from Livestock, by Farm Size

-										
		Ar	nnuai Sales				An	nual Sales		
	POULTRY	All	\$500,000	\$100,000-	Less Than	Poultry as : · · · · · · · · · · · · · · · · · ·	All	\$500,000	\$100,000-	Less Than
	(\$million)	Farms	or More	\$499,999	\$100,000	Livestock Sales	Farms	or More	\$499,999	\$100,000
-	lowa	\$192.2	\$139.0	\$44.9	\$8.3	lowa	3.6%	9.8%	1.6%	0.8%
	Illinois	59.4	39.7	16.2	3.3	Illinois	2.7%	6.9%	1.4%	
	Indiana	406.9	300.7	95.8	10.4	Indiana	21.0%	45.8%	11.1%	2.5%
	Kansas	25.3	13.5	9.9	1.9	Kansas	0.5%	0.4%	1.1%	0.3%
	Michigan	116.4	95.2	16.8	4.4	Michigan	9.2%	26.9%	2.7%	1.5%
	Minnesota	489.5	388.0	93.0	8.4	Minnesota	15.4%	55.1%	6.1%	
	Missouri	273.6	149.7	114.1	9.8	Missouri	12.5%	39.7%	13.4%	1.0%
	North Dakota	10.7	4.6	5.0	1.2	North Dakota	1.6%	6.0%	1.8%	0.4%
	Nebraska	54.4	46.0	6.3	2.1	Nebraska	1.2%	1.7%	0.5%	
	Ohio	281.2	208.5	61.8	11.0	Ohio	16.7%	48.6%	8.1%	
	South Dakota	35.6	29.3	4.5	1.8	South Dakota	1.9%	5.2%	0.6%	0.3%
	Wisconsin	144.8	114.9	26.1	3.9	Wisconsin	3.6%	29.5%	: 1.2%	0.3%
	N.C. REGION	2,090.1	1,529.1	494.3	66.4	N.C. REGION	6.2%	13.2%	3.6%	0.8%
	Kentucky	23.5	12.0	9.9	1.6	Kentucky	2.0%	3.8%	2.9%	0.3%
	Oklahoma	219.7	85.0	127.4	7.3	Oklahoma	10.4%	10.4%	18.6%	
	United States	12,758.3	7,588.2	4,758.8	411.3	United States	16.5%	22.8%	17.1%	2.6%

	Ar	nnual Sales				An	nual Sales		
					Dairy as				
DAIRY	All	\$500,000	\$100,000-	Less Than	% of Total	Ali	\$500,000	\$100,000-	Less Than
(\$million)	Farms	or More	\$499,999	\$100,000	Livestock sales	Farms	or More	\$499,999	\$100,000
lowa	\$392.3	\$13.7	\$246.6	\$131.9	lowa	7.4%	1.0%	8.8%	12.5%
Illinois	280.3	12.5	201.3	66.5	Illinois	12.6%	2.2%	17.1%	14.49
Indiana	243.2	13.5	155.9	73.8	Indiana	12.5%	2.1%	18.0%	17.70
Kansas	140.2	10.6	96.6	33.1	Kansas	2.9%	0.3%	11.2%	5.9%
Michigan	568.2	64.9	379.9	123.5	Michigan	44.7%	18.3%	60.9%	41.99
Minnesota	1,059.5	19.3	584.4	455.9	Minnesota	33.4%	2.7%	38.3%	48.2°
Missouri	328.0	6.8	195.4	125.9	Missouri	15.0%	1.8%	23.0%	13.19
North Dakota	106.5	2.9	54.0	49.6	North Dakota	15.4%	3.8%	19.4%	14.89
Nebraska	131.0	11.0	82.3	37.6	Nebraska	2.9%	0.4%	6.5%	6.09
Ohio	534.7	33.1	328.1	173.5	Ohio	31.8%	7.7%	43.1%	35.29
South Dakota	168.7	10.6	94.9	63.1	South Dakota	9.1%	1.9%	12.8%	11.49
Wisconsin	2,754.9	81.7	1,588.4	1,084.8	Wisconsin	69.3%	21.0%	74.9%	74.29
N.C. REGION	6,707.6	280.6	4,007.9	2,419.1	N.C. REGION	20.0%	2.4%	28.9%	29.79
Kentucky	260.8	8.3	135.1	117.4	Kentucky	22.0%	2.6%	39.4%	22.49
Oklahoma	121.2	18.6	76.1	26.4	Oklahoma	5.8%	2.3%	11.1%	4.49
United States	16,029.2	3,766.5	8,432.0	3.830.7	United States	20.8%	11.3%	30.3%	23.99

Annual Sales					Annual Sales Cattle as					
CATTLE (\$million)	Ali Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	% of Total Livestock sales	· All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	
lowa	\$2,124.6	\$864.7	\$848.9	\$411.0	lowa	40.3%	61.1%	30.3%	39.1%	
Illinois	780.2	266.0	326.5	187.6	Illinois	35.2%	46.2%	27.7%	40.7%	
Indiana	420.0	120.0	157.4	142.6	Indiana	21.6%	18.3%	18.2%	34.2%	
Kansas	4,305.3	3,250.9	619.4	435.1	Kansas	90.0%	96.6%	72.1%	78.0%	
Michigan	320.3	121.3	107.1	91.9	Michigan	25.2%	34.3%	17.2%	31.2%	
Minnesota	749.4	159.0	327.4	263.0	Minnesota	23.6%	22.6%	21.5%	27.8%	
Missouri	1,067.6	150.2	284.7	632.6	Missouri	48.9%	39.8%	33.5%	66.1%	
North Dakota	496.0	57.9	184.0	254.1	North Dakota	71.8%	75.8%	66.0%	75.7%	
Nebraska	3,564.9	2,391.1	772.6	401.2	Nebraska	78.7%	90.5%	61.2%	64.3%	
Ohio	426.1	108.6	155.8	161.7	Ohio	25.3%	25.3%	20.5%	32.8%	
South Dakota	1,273.1	447.9	463.3	361.9	South Dakota	68.4%	79.5%	62.3%	65.1%	
Wisconsin	749.0	118.4	349.2	281.5	Wisconsin	18.9%	30.4%	16.5%	19.2%	
N.C. REGION	16,276.6	8,056.1	4,596.4	3,624.1	N.C. REGION	48.5%	69.7%	33.1%	44.4%	
Kentucky	472.3	32.0	107.2	333.2	Kentucky	39.8%	10.1%	31.2%	63.6%	
Oklahoma	1,699.9	697.9	465.5	536.5	Oklahoma	80.8%	85.3%	67.8%	89.5%	
United States	35,876.7	18,441.3	8,714.5	8,720.9	United States	46.5%	55.4%	31.3%	54.5%	
	Ar	nnual Sales				 `An	nual Sales			
					Hogs and Pigs					
HOGS AND PIGS	All	\$500,000		Less Than	% of Total	, All	\$500,000	\$100,000-		
(\$million)	Farms	or More	\$499,999	\$100,000	Livestock sales	Farms	or More	\$499,999	\$100.000	
lowa	\$2,494.2	\$380.4	\$1,641.0	\$472.8	lowa	47.4%	26.9%	58.6%	44.9%	
Illinois	1,062.5	247.4	627.3	187.8	Illinois	47.9%	42.9%	53.1%	40.8%	
Indiana	847.7	216.7	452.5	178.5	Indiana	43.7%	33.0%	52.2%	42.8°5	
Kansas	284.4	85.0	125.8	73.6	Kansas	5.9%	2.5%	14.6%	13.2°6	
Michigan	226.1	61.4	109.6	55.2	Michigan	17.8%	17.3%	17.6%	18.7%	
Minnesota	811.8	120.2	499.4	192.1	Minnesota	25.6%	17.1%	32.8%	20.3%	
Missouri	492.3	68.4	249.3	174.6	Missouri	22.5%	18.1%	29.3%	18.2%	
North Dakota	47.4	4.0	25.6	17.8	North Dakota	6.9%	5.2%	9.2%	5.3⁰≈	
Nebraska	746.5	184.9	393.7	168.0	Nebraska	16.5%	7.0%	31.2%	26.9%	
Ohio	383.2	56.2	. 206.2	120.8	Ohio	22.8%	13.1%	27.1%	24.5%	
South Dakota	317.0	59.4	157.2	100.4	South Dakota	17.0%	10.5%	21.1%	18.10-	
Wisconsin	244.8	42.0	130.6	72.2	Wisconsin	6.2%	10.8%	6.2%	4.9⁰≈	
N.C. REGION	7,957.9	1,526.0	4,618.0	1,813.9	N.C. REGION	23.7%	13.2%	33.3%	22.2°5	
Kentucky	146.6	30.0	61.5	55.1	Kentucky	12.4%	9.4%	17.9%	10.5%	
Oklahoma	33.1	10.3	10.2	12.5	Oklahoma	1.6%	1.3%	1.5%	2.1%	
United States	9,890.6	2,301.0	5,304.3	2,285.3	United States	12.8%	6.9%	19.0%	14.3%	

		1A	nnual Sales			Sheep and Wool -	Annual Sales			
SHE	EEP AND WOOL	All.	\$500,000	\$100,000-	Less Than		All	\$500,000	\$100,000-	Less Than
	(\$million)	Farms	or More	\$499,999	\$100,000	Livestock sales	Farms	or More	\$499,999	\$100,000
	lowa	\$46.2	\$13.8	\$13.0	\$19.3	lowa	0.9%	1.0%	0.5%	1.8%
	Illinois	8.2	0.2	2.6	5.4	Illinois	0.4%	0.0%	0.2%	1.2%
	Indiana	4.8	0.1	1.1	3.6	Indiana	0.2%	0.0%	0.1%	0.9%
	Kansas	18.6	4.9	5.6	8.0	Kansas	0.4%	0.1%	0.7%	1.4%
	Michigan	5.6	0.1	1.3	4.3	Michigan	0.4%	0.0%	0.2%	1.5%
	Minnesota	20.5	4.6	5.0	10.9	Minnesota	0.6%	0.7%	0.3%	1.2%
•	Missouri	5.9	0.1	1.0	4.9	Missouri	0.3%	0.0%	0.1%	0.5%
	North Dakota	12.7	1.6	. 3.5	7.7	North Dakota	1.8%	2.1%	1.2%	2.3%
•	Nebraska	18.5	7.4	3.4	7.7	Nebraska	0.4%	0.3%	0.3%	1.2%
	Ohio	15.2	1.7	2.6	10.9	Ohio	0.9%	0.4%	0.3%	2.2%
	South Dakota	44.8	6.8	15.2	22.8	South Dakota	2.4%	1.2%	2.0%	4.1%
	Wisconsin	5.3	0.3	0.6	4.4	Wisconsin	0.1%	0.1%	0.0%	0.3%
	N.C. REGION	206.3	41.6	54.8	109.8	N.C. REGION	0.6%	0.4%	0.4%	1.3%
	Kentucky	1.9	0.0	0.2	1.6	Kentucky	0.2%	0.0%	0.1%	0.3%
	Oklahoma	6.8	0.5	1.9	4.4	Oklahoma	0.3%	0.1%	0.3%	0.7%
	United States	791.2	276.7	245.2	269.4	United States	1.0%	0.8%	0.9%	
		Ai	nnual Sales				An	nual Sales	•	
						Other Livestock				
OTH	IER LIVESTOCK	All	\$500,000	\$100,000-	Less Than	% of Total	All		\$100,000-	Less Than
	(\$million)	Farms	or More	\$499,999	\$100,000	Livestock sales	Farms	or More	\$499,999	\$100,000
	lowa	\$17.1	\$3.1	\$4.8	\$9.3	lowa	0.3%	0.2%	0.2%	0.9%
	Illinois	27.3	10.2	6.8	10.2	Illinois	1.2%	1.8%	0.6%	2.2%
	Indiana	18.0	6.1	· · 4.0	7.9	Indiana	0.9%	0.9%	0.5%	1.9%
	Kansas	9.3	1.7	1.8	5.8	Kansas	0.2%	0.1%	0.2%	1.0%
	Michigan	35.5	10.9	9.0	15.7	Michigan	2.8%	3.1%	1.4%	5.3%
	Minnesota	44.9	13.5	15.2	16.2	Minnesota	1.4%	1.9%	1.0%	1.7%
•	Missouri	16.7	2.1	5.0	9.5	Missouri	0.8%	0.6%	0.6%	1.0%
	North Dakota	17.6	5.4	6.7	5.5	North Dakota	2.5%	7.1%		
	Nebraska	12.7	2.3	3.2	7.1	Nebraska	0.3%	0.1%		
	Ohio	42.8	20.8	6.5	15.5	Ohio	2.5%	4.8%		
	South Dakota	22.8	9.1	8.2	5.6	South Dakota	1.2%			
	Wisconsin	74.5	32.2	26.5	15.9	Wisconsin	1.9%			
•	- N.C. REGION	339.2	117.5	97.6	124.1	N.C. REGION	1.0%			
•	Kentucky	280.6	236.0	29.3	15.3	Kentucky	23.7%			
	Oklahoma						•			
	United States	24.2	6.2	5.6	12.3	Oklahoma	1.2%			
	United States	1,771.4	888.5	395.8	487.0	United States	2.3%	2.7%	1.4%	3.0%

Table 9. Land Owned and Rented per Farm, by Farm Size

		Annual S	Sales				Annual S.		
					Owned as				
OWNED (acres per farm	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Percent of Total Acres	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100.000
(40.00 por 14									3100,000
Iowa	162	477	244	129	lowa	53.8%	49.4%	42.4%	64.9%
Illinois	146	608	251	110	Illinois	45.3%	42.7%	33.3%	58.7%
Indiana	130	508	270	101	Indiana	56.6%	44.4%	39.3%	72.6%
Kansas	355	1713	812	268	Kansas	52.2%	46.8%	42.1%	58.9%
Michigan	139	719	339	105	Michigan	68.8%	58.0%	55.6%	77.8%
Minnesota	202	748	350	162	Minnesota	64.7%	55.9%	52.3%	73.9%
Missouri	193	1006	447	167	Missouri	70.2%	55.9%	48.7 %	78.8%
North Dakota	652	2195	1095	552	North Dakota	57.0%	52.1%	48.8%	61.1%
Nebraska	453	2434	826	297	Nebraska	60.5%	61.8%	53.7%	66.7%
Ohio	115	444	259	96	Ohio	60.5%	45.6%	41.2%	71.7%
South Dakota	839	3755	1466	661	South Dakota	69.1%	66.4%	60.0%	74.8%
Wisconsin	170	818	288	134	Wisconsin	76.9%	67.8%	67.1%	84.0%
N.C. REGION	245	1162	458	191	N.C. REGION	60.2%	55.1%	48.2%	68.8%
Kentucky	119	843	404	107	Kentucky	78.7%	57.3%	55.6%	84.3%
Oklahoma	276	2257	894	218	Oklahoma	61.5%	54.7%	50.2%	66.5%
United States	294	2500	688	197	United States	63.6%	63.8%	53.5%	70.4%

		Annual S	Sales		Bosted In on		Annual Sales			
RENTED IN	All	\$500,000	\$100,000-	Less Than	Rented In as Percent of	All	\$500,000	\$100,000-	Less Than	
(acres per farm	Farms	or More	\$499,999	\$100,000	Total Acres	Farms	or More	\$499,999	\$100,000	
lowa	159	512	349	91	lowa	52.9%	53.0%	60.5%	45.8%	
Illinois	193	854	520	95	Illinois	60.2%	60.0%	68.8%	50.8%	
Indiana	113	674	431	52	Indiana	49.4%	58.9%	62.6%	37.2%	
Kansas	377	2103	1175	236	Kansas	55.5%	57.4%	61.0%	51.9%	
Michigan	70	539	277	37	Michigan	34.8%	43.5%	45.5%	27.5%	
Minnesota	126	634	332	73	Minnesota	40.2%	47.4%	49.6%	33.2%	
Missouri	- 98	844	488	61	Missouri	35.6%	46.9%	53.2%	28.6%	
North Dakota	558	2184	1201	420	North Dakota	48.8%	51.8%	53.6%	46.4%	
Nebraska	354	1615	773	205	Nebraska	47.3%	41.0%	50.3%	46.0%	
Ohio	84	545	376	47	Ohio	44.3%	56.0%	59.9%	35.4%	
South Dakota	467	2232	1043	318	South Dakota	38.5%	39.5%	42.7%	35.9%	
Wisconsin	59	- 414	146	34	Wisconsin	26.5 %	34.3%	34.0%	21.0%	
N.C. REGION	188	1019	516	112	N.C. REGION	46.1%	48.3%	54.3%	40.4%	
Kentucky	39	649	336	26	Kentucky	25.7 %	44.1%	46.2%	20.8%	
Oklahoma	201	2055	942	136	Oklahoma	44.8%	49.8%	52.8%	41.3%	
United States	196	1595	636	106	United States	42.5%	40.7%	49.5%	38.1%	

		Annual S	ales		Samuel Control	Annual Sales				
RENTED OUT (acres per farm)	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Rented Out as Percent of Total Acres	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	
lowa	20	24	16	21	lowa	6.7%	2.5%	2.9%	10.7%	
Illinois	18	39	16	18	Illinois	5.5%	2.8%	2.1%	9.5%	
Indiana	14	37	13	14	Indiana	6.0%	3.2%	1.8%		
Kansas	52	154	60.	49	Kansas	7.7%	4.2%	3.1%	10.8%	
Michigan	7	18	7	7	. Michigan	3.6%	1.5%	1.1%	5.2°6	
Minnesota	15	44	13	15	Minnesota	4.9%	3.3%	1.9%		
Missouri	16	50	17	16	Missouri	5.8%	2.8%	1.9%	7.4%	
North Dakota	67	162	54	68	North Dakota	5.8%	3.8%	2.4%	7.6%	
Nebraska	59	108	62	57	Nebraska	7.8%	2.7%	4.0%	12.7%	
Ohio	9	15	7	9	Ohio	4.9%	1.6%	1.1%	7.1%	
South Dakota	92	330	66	· 95	South Dakota	7.6%	5.8%	2.7%	10.7%	
Wisconsin	7	25	5	8	Wisconsin	3.4%	2.1%	1.1%	5.0%	
N.C. REGION	26	71	24	25	N.C. REGION	6.3%	3.4%	2.5%		
Kentucky	7	20	13	6	Kentucky	4.4%	1.4%	1.8%		
Oklahoma	28	187	54	25	Oklahoma	6.3%	4.5%	3.0%	7.7%	
United States	28	176	40	24	United States	6.1%	4.5%	3.1%		

	Annual S	ales	
All	\$500,000	\$100,000-	Less Than
Farms	or More	\$499,999	\$100,000
301	965	577	198
321	1,422	755	188
229	1,145	689	139
680	3,662	1,927	454
202	1,240	608	135
312	1,339	669	219
275	1,800	917	212
1,143	4,217	2,242	904
749	3,941	1,538	446
189	974	629	133
1,214	5,658	2,444	884
221	1,207	429	160
407	2,110	950	277
152	1,472	727	127
449	4,124	1,782	329
462	3,920	1,284	279
	Farms 301 321 229 680 202 312 275 1,143 749 189 1,214 221 407 152 449	All \$500,000 Farms or More 301 965 321 1,422 229 1,145 680 3,662 202 1,240 312 1,339 275 1,800 1,143 4,217 749 3,941 189 974 1,214 5,658 221 1,207 407 2,110 152 1,472 449 4,124	Farms or More \$499,999 301 965 577 321 1,422 755 229 1,145 689 680 3,662 1,927 202 1,240 608 312 1,339 669 275 1,800 917 1,143 4,217 2,242 749 3,941 1,538 189 974 629 1,214 5,658 2,444 221 1,207 429 407 2,110 950 152 1,472 727 449 4,124 1,782

Table 10. Land Use, Acres per Farm, by Farm size

Annual Sales					Annual Sales					
HARVESTED	All	\$500,000	\$100,000-	Less Than	Cropland as %	All	\$500,000	\$100,000-	Less Than	
CROPLAND	Farms	or More	\$499,999	\$100,000	of Total Acres	Farms	or More	\$499,999	\$100,000	
lowa	221	758	420	136	lowa	73.3%	78.6%	72.9%	68.6%	
Illinois	251	1,183	578	138	Illinois	78.2%	83.2%	76.6%	73.7%	
Indiana	174	1,072	535	93	Indiana	75.7%	93.6%	77.7%	67.4%	
Kansas	307	1,376	822	204	Kansas	45.1%	37.6%	42.7%	44.9%	
Michigan	134	977	449	78	Michigan	66.5%	78.8%	73.7%	57.7%	
Minnesota	217	1,202	498	136	Minnesota	69.6%	89.8%	74.4%	62.4%	
Missouri	145	1,192	558	93	Missouri	52.7%	66.2%	60.8%	44.0%	
North Dakota	567	2,648	1,209	413	North Dakota	49.6%	62.8%	53.9%	45.7%	
Nebraska	299	1,081	574	188	Nebraska	39.9%	27.4%	37.3%	42.2%	
Ohio	132	881	480	83	Ohio	69.6%	90.5%	76.4%	62.0%	
South Dakota	417	2,010	855	282	South Dakota	34.4%	35.5%	35.0%	31.9%	
Wisconsin	135	903	293	86	Wisconsin	61.1%	74.8%	68.4%	53.9%	
N.C. REGION	225	1,138	548	141	N.C. REGION	55.4%	53.9%	57.7%	50.7%	
Kentucky	51	1,025	411	35	Kentucky	33.7%	69.6%	56.6%	27.2%	
Oklahoma	168	946	572	119	Oklahoma	37.5%	22.9%	32.1%	36.3%	
United States	172	1,054	496	. 98	United States	37.2%	26.9%	38.6%	35.1%	

		Annual S	ales				Annual S	ales	s		
	All	\$500,000	\$100,000-	Less Than	Pasture as %	All	\$500,000	\$100,000-	Less Than		
PASTURE	Farms	or More	\$499,999	\$100,000	of Total Acres	Farms	or More	\$499,999	\$100,000		
lowa	25	42	33	21	lowa	8.2%	4.4%	5.7%	10.7%		
Illinois	13	35	19	11	Illinois	4.0%	2.5%	2.5%	5.7%		
Indiana	12	26	17	. 11	Indiana	5.3%	2.2%	2.5%	7.9%		
Kansas	60	113	94	54	Kansas	8.9%	3.1%	4.9%	11.8%		
Michigan	11	23	-16	10	Michigan	5.6%	1.9%	2.6%	7.7%		
Minnesota	15	22	17	14	Minnesota	4.7%	1.6%	2.6%	6.4%		
Missouri	67	137	102	63	Missouri	24.4%	7.6%	11.1%	29.6%		
North Dakota	47	24	-51	46	North Dakota	4.1%	0.6%	2.3%	5.1%		
Nebraska	50	136	61	44	Nebraska	6.7%	3.5%	4.0%	9.9%		
Ohio	13	22	20	12	Ohio	7.1%	2.3%	3.2%	9.3%		
South Dakota	77	120	98	71	South Dakota	6.3%	2.1%	4.0%	8.0%		
Wisconsin	17	42	24	15	Wisconsin	7.6%	3.5%	5.6%	9.2%		
N.C. REGION	31	63	40	28	N.C. REGION	7.6%	3.0%	4.2%	10.3%		
Kentucky	41	234	115	38	Kentucky	26.9%	15.9%	15.8%	29.6%		
Oklahoma	102	213	155	95	Oklahoma	22.7%	5.2%	8.7%	29.0%		
United States	40	75	49	37	United States	8.6%	1.9%	3.8%	13.4%		

Annual Sales						Annual				
RANGELAND	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Rangeland as % of Total Acres	All Farms	\$500,000 or More	\$100,000- \$499,999		
lowa	16	57	21	13	lowa	5.2%	5.9%	3.7%	6.4%	
Illinois	9	32	14	7	Illinois	2.8%	2.3%	1.8%	3.8%	
Indiana	7	21	11	6	Indiana	3.1%	1.8%	1.5%	4.5%	
Kansas	229	2092	611	136	Kansas	33.7%	57.1%	31.7%	29.8%	
Michigan	5	30	7	4	Michigan	2.5%	2.4%	1.2%	3.2%	
Minnesota	14	49	18	12	Minnesota	4.3%	3.6%	2.7%	5.5%	
Missouri	46	376	107	38	Missouri	16.9%	20.9%	11.6%	17.9%	
North Dakota	315	1091	498	270	North Dakota	27.6%	25.9%	22.2%	29.9%	
Nebraska	399	3027	757	209	Nebraska	53.3%	76.8%	. 49.2%	47.0%	
Ohio	10	37	17	9	Ohio	5.4%	3.8%	2.7%	7.0%	
South Dakota	742	3419	1241	574	South Dakota	61.1%	60.4%	50.8%	64.9%	
Wisconsin	12	66	17	10	Wisconsin	5.4%	5.5%	4.0%	6.3%	
N.C. REGION	102	841	. 199	70	N.C. REGION	25.0%	39.9%	21.0%	25.1%	
Kentucky	15	370	64	12	Kentucky	9.8%	25.1%	8.8%	9.5%	
Oklahoma	328	3451	1050	224	Okiahoma	73.0%	83.7%	58.9%	68.0%	
United States	250	2962	609	135	United States	54.0%	75.5%	47.4%	48.3%	

		Annual S	ales			Annual Sales				
	All	\$500,000	\$100,000-	Less Than	Woodland as %	All	\$500,000	\$100,000-	Less Than	
WOODLAND	Farms	or More	\$499,999	\$100,000	of Total Acres	Farms	or More	\$499,999	\$100,000	
lowa	14	22	16	13	lowa	4.7%	2.3%	2.7%	6.8%	
Illinois	21	51	30	18	Illinois	6.6%	3.6%	4.0%	9.7%	
Indiana	23	55	36	20	Indiana	10.0%	4.8%	5.2%	14.6%	
Kansas	12	26	16	12	Kansas	1.8%	0.7%	0.8%	2.5%	
Michigan	27	73	46	24	Michigan	13.5%	5.9%	7.6%	17.7%	
Minnesota	28	46	22	29	Minnesota	8.9%	3.5%	3.4%	13.3%	
Missouri	59	159	79	57	Missouri	21.5%	8.9%	8.6%	26.7%	
North Dakota	12	24	16	11	North Dakota	1.0%	0.6%	0.7%	1.2%	
Nebraska	9	14	9	8	Nebraska	1.2%	0.4%	0.6%	1.9%	
Ohio	23	35	33	22	Ohio	12.1%	3.6%	5.2%	16.1%	
South Dakota	10	11	14	9	South Dakota	0.8%	0.2%	0.6%	1.0%	
Wisconsin	46	179	58	41	Wisconsin	20.8%	14.8%	13.6%	25.9%	
N.C, REGION	26	50	30	24	N.C. REGION	6.3%	2.3%	3.1%	8.8%	
Kentucky	37	83	72	36	Kentucky	24.6%	5.6%	9.9%	28.3%	
'Oklahoma	47	·186	62	44	Oklahoma	10.5%	4.5%	3.5%	13.4%	
United States	49	329	65	. 40	United States	10.5%	8.4%	5.1%	14.5%	

Table 11. Productivity Levels Of Grain Crops and Dairy, by Farm Size

Α	n	n	11	a	I Sa	les

Annual Sales

									1
CORN	All	\$500,000	\$100,000-	Less Than	SOYBEANS	All	\$500,000	\$100,000-	
(bu. per acre)	Farms	or More	\$499,999	\$100,000	(bu. per acre)	Farms	or More	\$499,999	\$100,000
lowa	126	138	131	117	lowa	41	² . 45	43	39
Illinois	128	139	133	118	Illinois	38	42	40	35
Indiana	127	138	132	117	Indiana	39	43	41	. 36
Kansas	116	128	122	99	Kansas	30	37	33	27
Michigan	96	110	101	87	Michigan	35	40	38	33
Minnesota	119	134	126	110	Minnesota	38	40	. 40	36
Missouri	105	122	113	96	Missouri	31	37	32	29
North Dakota	88	108	94	74	North Dakota	30	35	31	28
Nebraska	123	142	. 131	108	Nebraska	34	39	36	. 32
Ohio	114	126	121	107	Ohio	36	39	38	34
South Dakota	77	93	83	71	South Dakota	31	34	33	30
Wisconsin	112	123	117	104	Wisconsin	39	42	41	36
N.C. REGION	118	132	125	108	N.C. REGION	37	41	39	34
Kentucky	100	121	108	89	Kentucky	27	32	28	24
Oklahoma	106	150	112	78	Oklahoma	24	28	27	22
United States	115	127	121	104	United States	33	34	35	31

Wheat--Bu. per Acre

Dairy Products Sold per Cow

		vviieatbu.							
WHEAT (bu. per acre)	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	DAIRY SALES (\$ per cow)	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	38	43	39	36	Iowa	\$1,330	\$1,675	\$1,497	\$1,081
Illinois	51	55	54	. 49	Illinois	1,504	1,615	1,673	1,140
Indiana	52	56	55	49	Indiana	1,484	1,924	1,659	1,174
Kansas	34	37	36	32	Kansas	1,451	1,912	1,620	1,049
Michigan	46	51	49	44	Michigan	1,649	2,000	1,761	1,281
Minnesota	40	45	43	37	Minnesota	1,493	1,709	1,690	1,292
Missouri	43	49	45	40	Missouri	1,355	1,602	1,568	1,112
North Dakota	28	42	33	25	North Dakota	1,105	1,436	1,303	937
Nebraska	39	42	42		Nebraska	1,246	1,662	1,397	951
Ohio	51	55	53		Ohio	1,540	1,910	1,731	1,236
South Dakota	28	32	30		South Dakota	1,231	1,400	1,374	1,047
Wisconsin	44	45	46		Wisconsin	1,580	1,898	1,781	1,342
N.C. REGION	34	40	38		N.C. REGION	1,501	1,833	1,687	1,248
Kentucky	45	53	47		Kentucky	1,163	1,692	1,437	937
Oklahoma	27	30		• • •	Oklahoma	1,339	1,568	1,493	956
United States	. 35	48	39		United States	1,589	1,900	1,696	1,223

Table 12. Farm Expense per Cropland Acre (\$)

		Annual S	Sales			•	Annual S	ales	
FERTILIZER (\$ per acre)	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Percent of Crop Acres with Fertilizer Expense	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	\$17.12	\$23.36	\$19.43	\$14.14	lowa	48.8%	59.3%	52.2%	44.2%
Illinois	22.48	29.02	23.89	19.99	Illinois	57.5%	65.8%	58.1%	55.9%
Indiana	26.08	32.62	29.46	21.87	Indiana	64.7%	72.2%	68.1%	60.4%
. Kansas	6.89	12.21	8.50	5.48	Kansas	. 44.1%	56.5%	49.7%	39.8%
Michigan	23.78	37.43	30.06	17.47	Michigan	64.8%	78.1%	75.2%	55.6%
Minnesota	15.02	22.54	17.86	12.04	Minnesota	54.0%	65.2%	60.2%	48.0%
· Missouri	12.35	19.76	16.29	10.15	Missouri	45.4%	58.9%	54.7%	40.4%
North Dakota	6.34	18.19	9.09	4.40	North Dakota	46.8%	70.9%	58.9%	39.3%
Nebraska	11.55	18.48	14.15	8.44	Nebraska	46.1%	55.3%	52.1%	39.9%
Ohio	23.18	36.22	27.41	19.51	Ohio	62.1%	73.7%	68.6%	57.1%
South Dakota	4.93	9.81	6.02	3.71	South Dakota	35.1%	53.2%	40.0%	30.1%
Wisconsin	20.36	39.64	25.39	14.59	Wisconsin	58.0%	77.1%	68.6%	47.8%
N.C. REGION	14.17	22.63	17.56	10.89	N.C. REGION	50.2%	63.1%	56.7%	44.3%
Kentucky	14.53	24.08	22.10	12.03	Kentucky	37.7%	64.3%	57.8%	31.0%
Oklahoma	7.08	15.19	10.17	5.58	Oklahoma	44.0%	69.9%	56.4%	38.4%
United States	15.08	33.11	17.74	10.51	United States	47.6%	65.9%	54.6%	40.0%

• • • • • • • • • • • • • • • • • • • •		Annual S	ales		Descript of Cross	2.5	Annual Sa	ales	
CHEMICALS (\$ per acre)	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	Percent of Crop Acres with Chemicals Expense	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	\$11.36	\$15.25	\$12.49	\$9.80	lowa	53.9%	59.0%	58.4%	48.8%
Illinois	13.40	18.40	13.82	12.28	Illinois	59.7%	62.2%	62.2%	56.4%
Indiana	13.51	17.99	14.60	11.84	Indiana	57.0%	63.1%	61.9%	51.4%
Kansas	3.98	7.27	4.78	3.23	Kansas	27.5%	33.0%	30.2%	25.5%
Michigan	14.67	31.20	17.36	10.43	Michigan	46.5%	62.9%	53.9%	38.9%
Minnesota	9.99	16.84	11.78	7.92	Minnesota	53.6%	65.8%	59.8%	47.4%
Missouri	6.98	13.89	10.46	5.03	Missouri	36.9%	57.4%	53.2%	28.3%
North Dakota	5.09	13.20	6.21	4.16	North Dakota	45.1%	54.4%	51.9%	41.1%
Nebraska	6.62	9.12	7.97	5.16	Nebraska	35.4%	39.7%	39.0%	31.8%
Ohio	12.83	22.06	14.60	11.03	Ohio	50.9%	60.8%	56.9%	46.2%
South Dakota	3.97	6.10	4.48	3.41	South Dakota	35.5%	44.4%	39.4%	32.1%
Wisconsin	9.03	28.94	10.06	6.44	Wisconsin	29.6%	51.7%	33.9%	24.2%
N.C. REGION	8.54	14.69	10.21	6.74	N.C. REGION	44.0%	52.3%	50.3%	38.5%
Kentucky	6.01	14.32	11.23	4.21	Kentucky	23.1%	55.5%	46.5%	15.2%
Oklahoma	3.74	7.96	5.00	3.08	Oklahoma	26.7%	56.0%	32.0%	23.4%
United States	10.58	31.82	11.78	6.54	United States	38.6%	50.6%	46.0%	31.7%

Table 13. Farm Expenses, by Farm Size

Annual Sales

		AIIII GEI GE	1193						
Total Expense per Farm	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000		·			
lowa	\$63,200	\$820,981	\$132,593	\$25,322					•
Illinois	51,330	700,557	126,026	21,550					
Indiana	45,084	852,536	144,948	16,867		*			
Kansas	80,439	3,291,233	146,852	19,359					
Michigan	43,221	953,260	160,059	16,171					
Minnesota	52,040	908,117	135,106	22,743					
Missouri	26,432	828,292	133,053	13,211					
North Dakota	52,312	707,695	139,975	30,133					
Nebraska	89,403	1,951,593	138,700	25,304					
Ohio	34,437	973,260	141,394	15,066					
South Dakota	58,783	1,199,358	130,744	26,324					
Wisconsin	48,453	804,015	121,245	23,033					
N.C. REGION	52,330	1,247,927	135,002	20,312					
Kentucky	16,073	1,075,562	130,205	8,922					
Oklahoma	33,594	1,682,946	167,554	13,286					
United States	51,797	1,324,284	146,233	15,647					
	···	Annual Sa	les				· · Annual S	Sales	
nterest Expense	All	\$500,000	\$100,000-	Less Than	Hired Labor	All	\$500,000	\$100,000-	Less Ti
per Farm	Farms	or More	\$499,999	\$100,000	per Farm	Farms	or More	\$499,999	\$100,0
lowa	\$5,508	\$44,018	\$12,649	\$2,429	lowa	\$2,686	\$51,739	\$6,221	\$
Illinois	5,047	46,993	13,456	2,171	Illinois	3,099	94,691	7,665	
Indiana	4,352	45,786	15,070	1,952	Indiana	2,783	95,062	9.108	
Kansas	4,581	57,728	14,838	2,289	Kansas	3,297	121,952	9.357	
Michigan	3,868	60,505	15,622	1,606	Michigan	4,738	169,580	19.091	
Minnesota	5,245	47,229	14,399	2,670	Minnesota	2,869	81,142	8,463	
Missouri	2,616	41,742	12,399	1,578	Missouri	1,544	87,108	10,059	
North Dakota	6,074	61,512	17,033	3,523	North Dakota	2,631	77,732	9,098	

Source: 1987 Census of Agriculture, U.S. Department of Commerce

62,403

40,423

49,664

52,514

50,556

103,896

60,938

56,616

13,689

13,153

14,228

14,476

13,935

13,230

15,004

12,987

2,526

1,604

3,002

2,620

2,218

1,241

1,490

1,672

Nebraska

Wisconsin

Kentucky

Oklahoma

United States

South Dakota

N.C. REGION

Ohio

4,315

2,751

2,609

4,159

3,027

1,710

1,776

5,205

96,258

166,902

65,874

131,109

98,178

197,116

96,643

185,600

. 8,447

11,590

7,586

11,808

9,108

15,032

11,017

14,048

697

454

599

576

675

509

730

1,005

6,093

3,024

5,522

5,330

4,634

1,941

2,694

3,908

Nebraska

South Dakota

N.C. REGION

United States

Wisconsin

Kentucky

Oklahoma

Ohio

		Annual Sa	les			•	Annual S	Sales	
	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000		All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	8.7%	5.4%	9.5%	9.6%	lowa	4.2%	6.3%	4.7%	2.1%
Illinois	9.8%	6.7%	10.7%	10.1%	Illinois	6.0%	13.5%	6.1%	2.3%
Indiana	9.7%	5.4%	10.4%	11.6%	Indiana	6.2%	11.2%	6.3%	2.5%
Kansas	5.7%	1.8%	10.1%	11.8%	Kansas	4.1%	3.7%	6.4%	2.8%
- Michigan	9.0%	6.3%	9.8%	9.9%	Michigan	11.0%	17.8%	11.9%	4.4%
Minnesota	10.1%	5.2%	10.7%	11.7%	Minnesota	5.5%	8.9%	6.3%	2.8%
Missouri	9.9%	5.0%	9.3%	11.9%	Missouri	5.8%	10.5%	7.6%	2.9%
North Dakota	11.6%	8.7%	12.2%	11.7%	North Dakota	5.0%	11.0%	6.5%	2.6%
 Nebraska 	6.8%	3.2%	9.9%	10.0%	Nebraska	4.8%	4.9%	6.1%	2.8%
Ohio	8.8%	4.2%	9.3%	10.6%	Ohio	8.0%	17.1%	8.2%	3.0%
South Dakota	9.4%	4.1%	10.9%	11.4%	South Dakota	4.4%	5.5%	5.8%	2.3%
Wisconsin	11.0%	6.5%	11.9%	11.4%	Wisconsin	8.6%	16.3%	9.7%	4.4%
N.C. REGION	8.9%	4.1%	10.3%	10.9%	N.C. REGION	5.8%	7.9%	6.7%	2.8%
Kentucky	12.1%	9.7%	10.2%	13.9%	Kentucky	10.6%	18.3%	11.5%	7.6%
Oklahoma	8.0%	3.6%	9.0%	11.2%	Oklahoma	5.3%	5.7%	6.6%	3.8%
United States	7.5%	4.3%	8.9%	10.7%	United States	10.0%	14.0%	9.6%	4.7%

· · · · · · · · · · · · · · · · · · ·	Percent of Far	ms with Inter	est Expense		Percent of F	arms with H	ired Labor E	Expense	
	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000		All Farms	\$500,000 or More	\$100,000- \$499,999	
lowa	64%	95%	85%	57%	lowa	47%	97%	72%	38%
Illinois	56%	92%	82%	49%	Illinois	39%	98%	72%	6 29%
Indiana	54%	92%	85%	49%	Indiana	36%	96%	69%	6 29%
Kansas	58%	93%	86%	53%	Kansas	36%	98%	74%	6 30%
Michigan	49%	90%	85%	44%	Michigan	35%	99%	81%	6 29%
Minnesota	63%	93%	87%	57%	Minnesota	44%	98%	75%	6: 37%
Missouri	48%	89%	83%	45%	Missouri	30%	96%	73%	6 26%
North Dakota	67%	93%	89%	63%	North Dakota	42%	100%	78%	6 35%
Nebraska	63%	92%	85%	56%	Nebraska	42%	98%	71%	6 33%
Ohio	46%	88%	84%	42%	Ohio	32%	97%	73%	6 27%
South Dakota	67%	93%	86%	62%	South Dakota	42%	95%	72%	6 35%
Wisconsin	59%	89%	84%	52%	Wisconsin	46%	98%	79%	6 37%
N.C. REGION	57%	92%	85%	51%	N.C. REGION	39%	97%	74%	6 32%
Kentucky	44%	88%	82%	42%	Kentucky	48%	99%	6 . 86%	6 47%
Oklahoma	46%	94%	84%	43%	Oklahoma	32%	98%	6 79%	6 28%
United States	49%	. 88%	82%	6 43%	United States	39%	97%	6 78%	. 33%

	•	Annual Sa	les		·	Annual Sales			
•	All	\$500,000	\$100,000-	Less Than		All	\$500,000	\$100,000-	Less Than
	Farms	or More	\$499,999	\$100,000		Farms	or More	\$499,999	\$100,000
lowa	16,557	128	1,517	14,912	lowa	15.7%	7.9%	6.0%	19.0%
Illinois	16,557	120	1,497	14,940	Illinois	18.6%	11.3%	8.1%	21.6%
Indiana	13,224	101	816	12,307	Indiana	18.8%	12.2%	8.1%	20.7%
Kansas	16,170	143	977	15,050	Kansas	23.6%	14.9%	11.6%	25.4%
Michigan	9,512	59	469	8,984	Michigan	18.6%	10.0%	8.1%	20.1%
Minnesota	12,146	71	826	11,249	Minnesota	14.3%	8.3%	5.3%	16.4%
Missouri	25,997	73	770	25,154	Missouri	24.5%	14.8%	9.2%	25.9%
North Dakota	5,209	16	262	4,931	North Dakota	14.8%	6.5%	4.6%	16.8%
Nebraska	10,839	164	1,109	9,566	Nebraska	17.9%	12.8%	8.7%	20.6%
Ohio	16,058	71	643	15,344	Ohio	20.3%	12.5%	8.1%	21.7%
South Dakota	6,647	61	604	5,982	South Dakota	18.3%	13.7%	9.5%	20.2%
Wisconsin	12,665	67	. 894	11,704	Wisconsin	16.9%	11.0%	6.1%	19.6%
N.C. REGION	161,581	1,074	10,384	150,123	N.C. REGION	18.7%	11.2%	7.4%	21.1%
Kentucky	21,031	33	387	20,611	Kentucky	22.7%	13.3%	11.7%	23.2%
Oklahoma	17,473	62	587	16,824	Oklahoma	24.9%	13.3%	12.7%	25.8%
United States	447,341	4,295	25,978	417,068	United States	21.4%	13.4%	9.9%	23.3%

Number	Whoco	Occupation	n ic	Earming

Percent Whose Occupation is Farming

	Annual Sales						Annual Sales			
	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000			All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	75,279	1,518	23,955	49,806		lowa	71.6%	93.1%	95.2%	63.5%
Illinois	57,122	993	17,671	38,458		Illinois	64.3%	93.8%	95.1%	55.6%
Indiana	36,654	733	9,319	26,602		Indiana	52.0%	88.6%	92.0%	44.7%
Kansas	42,607	854	7,903	33,850		Kansas	62.1%	89.2%	93.8%	57.2%
Michigan	26,112	561	5,500	20,051		Michigan	51.0%	95.4%	94.7%	44.8%
Minnesota	58,519	787	14,998	42,734		Minnesota	68.8%	91.5%	96.5%	62.2%
Missouri	53,694	453	7,799	45,442		Missouri	50.6%	91.9%	92.9%	46.7%
North Dakota	29,031	239	5,584	23,208		North Dakota	82.3%	97.2%	97.9%	79.1%
Nebraska	45,387	1,191	12,085	32,111		Nebraska	75.0%	93.1%	95.2%	69.0%
Ohio	39,569	497	7,324	31,748		Ohio	49.9%	87.2%	91.9%	44.9%
South Dakota	28,407	409	6,128	21,870		South Dakota	78.1%	92.1%	96.7%	73.9%
Wisconsin	53,342	561	14,246	38,535		Wisconsin	71.0%	92.4%	96.6%	64.5%
N.C. REGION	545,723	8,796	132,512	404,415	. 1	N.C. REGION	63.3%	92.0%	95.0%	56.7%
Kentucky	41,451	. 209	2,981	38,261		Kentucky	44.8%	83.9%	90.4%	43.0°
Oklahoma	33,052	395	4,013	28,644		Oklahoma	47.1%	84.9%	87.1%	6 44.0°
United States	1,138,179	28,770	242,209	867,200		United States	54.5%	89.8%	91.9%	6 48.4%

Number of Farm Operators with No Off-farm Work

Percent of Farm Operators with No Off-farm Work

	Annual Sales				Annual Sales				
	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000		All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	51,753	1,290	17,688	32,775	lowa	52.8%	84.4%	75.1%	4 5.0%
Illinois	38,565	810	12,368	25,387	Illinois	46.9%	81.2%	71.7%	39.7%
Indiana	25,127	605	6,469	18,053	Indiana	38.2%	78.0%	69.0%	32.4%
Kansas	29,462	727	5,765	22,970	Kansas	46.0%	81.7%	74.2%	41.49
Michigan	19,384	470	4,306	14,608	Michigan	39.9%	84.4%	78.5%	34.49
Minnesota	40,625	658	11,087	28,880	Minnesota	50.7%	82.3%	76.8%	44.5%
Missouri	40,016	376	5,810	33,830	Missouri	40.7%	81.7%	74.9%	37.59
North Dakota	19,542	197	4,108	15,237	North Dakota	59.8%	88.7%	78.4%	56.09
Nebraska	31,491	979	9,166	21,346	Nebraska	56.3%	84.4%	78.3%	49.69
Ohio	28,490	407	5,186	22,897	Ohio	38.2%	76.1 %	69.8%	34.4%
South Dakota	19,798	315	4,724	14,759	South Dakota	59.4%	79.7%	81.1%	54.49
Wisconsin	40,587	445	11,585	28,557	Wisconsin	57.5%	79.5%	83.5%	50.89
N.C. REGION	384,840	7,279	98,262	279,299	N.C. REGION	47.8%	82.0%	75.8%	42.0%
Kentucky	32,743	175	2,267	30,301	Kentucky	37.5%	72.3%	73.1%	36.19
Okiahoma	25,405	316	2,861	22,228	Oklahoma	38.4%	73.8%	67.8%	36.19
United States	844,476	23,500	180,818	640,158	United States	43.1%	78.8%	73.9%	38.09
umber of Farm (Operators wit	h 200 Days or	More Off-far	m Work	Percent of Farm C	perators wi	th 200 Days	or More Off-	farm Work
umber of Farm (Operators wit	h 200 Days or Annual		m Work	Percent of Farm C	operators wi		or More Off- al Sales	-farm Work
umber of Farm (Operators wit	Annual		m Work	Percent of Farm C	Operators wi	Annu		
umber of Farm (Annual	Sales		Percent of Farm C		Annu	al Sales	
	All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000		All Farms	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa	All Farms 25,928	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000	lowa	All Farms 26.5%	\$500,000 or More	\$100,000- \$499,999	Less Than \$100,000
lowa Illinois	All Farms 25,928 26,001	Annual \$500,000 or More 	\$100,000- \$499,999	Less Than \$100,000 	lowa Illinois	All Farms 26.5% 31.6%	\$500,000 or More 5.4% 5.1%	\$100,000- \$499,999 5.6% 5.6%	Less Than \$100,000
lowa Illinois Indiana	All Farms 25,928 26,001 28,153	\$500,000 or More 83 51 64	\$100,000- \$499,999 	Less Than \$100,000 24,518 24,987 27,201	lowa Illinois Indiana	All Farms 26.5% 31.6% 42.8%	\$500,000 or More 5.4% 5.1% 8.2%	\$100,000- \$499,999 5.6% 5.6% 9.5%	Less Than \$100,000 33.6 39.1 48.9
lowa Illinois Indiana Kansas	All Farms 25,928 26,001 28,153 21,677	\$500,000 or More 83 51 64 78	\$100,000- \$499,999 	Less Than \$100,000 24,518 24,987 27,201 20,990	lowa Illinois Indiana Kansas	All Farms 26.5% 31.6% 42.8% 33.8%	\$500,000 or More 5.4% 5.1% 8.2% 8.8%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8%	33.6 39.1 48.9 37.8
lowa Illinois Indiana Kansas Michigan	All Farms 25,928 26,001 28,153 21,677 20,818	83 51 64 78	\$100,000- \$499,999 	24,518 24,987 27,201 20,990 20,439	lowa Illinois Indiana Kansas Michigan	All Farms 26.5% 31.6% 42.8% 33.8% 42.9%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3%	33.6 39.1 48.9 37.8 48.1
Iowa Illinois Indiana Kansas Michigan Minnesota	All Farms 25,928 26,001 28,153 21,677 20,818 22,006	83 51 64 78 31	\$100,000- \$499,999 1,327 963 888 609 348 679	24,518 24,987 27,201 20,990 20,439 21,263	lowa Illinois Indiana Kansas Michigan Minnesota	All Farms 26.5% 31.6% 42.8% 42.9% 27.4%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7%	33.6 39.1 48.9 37.8 48.1 32.7
lowa Illinois Indiana Kansas Michigan Minnesota Missouri	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925	\$500,000 or More 83 51 64 78 31 64 32	\$100,000- \$499,999 1,327 963 888 609 348 679 591	24,518 24,987 27,201 20,990 20,439 21,263 40,302	lowa Illinois Indiana Kansas Michigan Minnesota Missouri	All Farms 26.5% 31.6% 42.8% 33.8% 42.9% 27.4% 41.6%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 8.0%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6%	33.6 39.1 48.9 37.8 48.1 32.7 44.7
lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295	Annual \$500,000 or More 83 51 64 78 31 64 32 7	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166	24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota	All Farms 26.5% 31.6% 42.8% 42.9% 27.4% 41.6% 16.2%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 8.0% 7.0%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2%	33.6 39.1 48.9 37.8 48.1 32.7 44.7 18.8
lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295 13,099	83 51 64 78 31 64 32 7	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166 602	24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122 12,425	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska	All Farms 26.5% 31.6% 42.8% 42.9% 27.4% 41.6% 16.2% 23.4%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 8.0% 7.0% 3.2% 6.2%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2% 5.1%	33.6 39.1 48.9 37.8 48.1 32.7 44.7 18.8 28.9
Iowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295 13,099 32,749	Annual \$500,000 or More 83 51 64 78 31 64 32 7 72 59	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166 602 747	Less Than \$100,000 24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122 12,425 31,943	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio	All Farms 26.5% 31.6% 42.8% 33.8% 42.9% 41.6% 16.2% 23.4% 43.9%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 8.0% 7.0% 3.2% 6.2%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2% 5.1% 10.0%	33.6 39.1 48.9 37.8 48.1 32.7 44.7 18.8 28.9 48.0
lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295 13,099 32,749 6,641	Annual \$500,000 or More 83 51 64 78 31 64 32 7 72 59 41	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166 602 747 225	24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122 12,425 31,943 6,375	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota	All Farms 26.5% 31.6% 42.8% 33.8% 42.9% 41.6% 16.2% 23.4% 43.9% 19.9%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 8.0% 7.0% 3.2% 6.2% 11.0%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2% 5.1% 10.0% 3.9%	33.6 39.1 48.9 37.8 48.1 32.7 44.7 18.8 28.9 48.0 23.5
lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota Wisconsin	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295 13,099 32,749 6,641 18,776	83 51 64 78 31 64 32 7 72 59 41	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166 602 747 225 651	Less Than \$100,000 24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122 12,425 31,943 6,375 18,081	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota Wisconsin	All Farms 26.5% 31.6% 42.8% 42.9% 41.6% 16.2% 23.4% 43.9% 19.9% 26.6%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 7.0% 3.2% 6.2% 11.0% 10.4% 7.9%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2% 5.1% 10.0% 3.9% 4.7%	33.6 39.1 48.9 37.8 48.1 32.7 44.7 18.8 28.9 48.0 23.5 32.2
lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295 13,099 32,749 6,641	Annual \$500,000 or More 83 51 64 78 31 64 32 7 72 59 41	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166 602 747 225	24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122 12,425 31,943 6,375	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota	All Farms 26.5% 31.6% 42.8% 33.8% 42.9% 41.6% 16.2% 23.4% 43.9% 19.9%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 7.0% 3.2% 6.2% 11.0% 10.4% 7.9%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2% 5.1% 10.0% 3.9% 4.7%	33.65 39.15 48.9 37.8 48.1 32.7 44.7 18.8 28.9 48.0 23.5 32.2
lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota Wisconsin	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295 13,099 32,749 6,641 18,776	83 51 64 78 31 64 32 7 72 59 41	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166 602 747 225 651	Less Than \$100,000 24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122 12,425 31,943 6,375 18,081	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota Wisconsin	All Farms 26.5% 31.6% 42.8% 42.9% 41.6% 16.2% 23.4% 43.9% 19.9% 26.6%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 8.0% 7.0% 3.2% 6.2% 11.0% 10.4% 7.9%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2% 5.1% 10.0% 4.7% 6.3.9% 6.3.9% 6.0%	Less Than \$100,000 33.6° 39.1° 48.9° 37.8° 48.1° 28.9° 48.0° 23.5° 32.2° 38.1°
lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota Wisconsin N.C. REGION	All Farms 25,928 26,001 28,153 21,677 20,818 22,006 40,925 5,295 13,099 32,749 6,641 18,776 262,068	Annual \$500,000 or More 83 51 64 78 31 64 32 7 72 59 41 44 626	\$100,000- \$499,999 1,327 963 888 609 348 679 591 166 602 747 225 651 7,796	Less Than \$100,000 24,518 24,987 27,201 20,990 20,439 21,263 40,302 5,122 12,425 31,943 6,375 18,081 253,646	lowa Illinois Indiana Kansas Michigan Minnesota Missouri North Dakota Nebraska Ohio South Dakota Wisconsin N.C. REGION	All Farms 26.5% 31.6% 42.8% 33.8% 42.9% 41.6% 41.6% 43.9% 43.9% 26.6% 32.6%	\$500,000 or More 5.4% 5.1% 8.2% 8.8% 5.6% 8.0% 7.0% 11.0% 10.4% 7.9% 7.0%	\$100,000- \$499,999 5.6% 5.6% 9.5% 7.8% 6.3% 4.7% 7.6% 3.2% 5.1% 10.0% 6.39% 4.7% 6.0%	33.6° 39.1° 48.9° 37.8° 48.1° 32.7° 44.7° 18.8° 28.9° 48.0° 23.5° 32.2° 38.1° 44.8°

TABLE 16. Occupation of employed persons 15 years of age and over who live on Midwest farms, 1988.

Farm Occupation	Total Number (1,000)	Percent by Occupation	Percent of Total
Operators/Managers Farm Workers	511 <u>166</u>	75.5% <u>24.5</u> %	36.4 <i>%</i> 11.8 <i>%</i>
Total Farm	677	100.0%	
Nonfarm Occupation			
Managerial and professional Technical/Sales/Administrative Service Precision/Production/Craft/Repair Operators/Fabricators/Labors Forestry/Fishing Total Nonfarm	129 216 128 105 145 <u>3</u> 726	17.8% 29.8% 17.6% 14.5% 20.0% <u>0.4</u> %	9.2% 15.4% 9.1% 7.5% 10.3% 0.2%
Total Farm and Nonfarm	1,403		100.0%

Source: Rural and Rural Farm Population: 1988, USDA, US Dept. Commerce

TABLE 17. Industry of employed persons 15 years of age and over who live on Midwest farms, 1988.

Industry	Number (1,000)	Percent Non-farm	Percent of Total
Agriculture Service	694 241	34.0%	49.5% 17.2%
Manufacturing	143	20.2%	10.2%
Retail Trade	122	17.2%	8.7%
Transportation/Communications	50	7.1%	3.6%
Construction	46	6.5%	3.3%
Wholesale Trade	41	5.8%	2.9%
Finance/Insurance/Real Estate	36	5.1%	2.6%
Public Administration	24	3.4%	1.7%
Mining	5	0.7%	0.4%
Forestry/Fisheries	1	0.1%	0.1%
	1,403	100.0%	100.0%

Source: Rural and Rural Farm Population: 1988, USDA, US Dept. Commerce

TABLE 18. Income of households and families, farm residence, U.S., 1987

	Households		Families	
Total Money Income	Number (1.000)	Percent	Number (1,000)	Percent
Under \$5,000 \$5,000 to \$9,999 \$10,000 to \$14,999 \$15,000 to \$19,999 \$20,000 to \$24,999 \$25,000 to \$29,999 \$30,000 to \$34,999 \$35,000 to \$39,999 \$40,000 to \$49,999 \$50,000 to \$74,999 \$75,000 and over Total Median Income (dollars) Mean Income (dollars)	95 138 228 186 224 166 138 94 180 156 <u>78</u> 1,683 \$24,129 \$29,822	5.6% 8.2% 13.5% 11.1% 13.3% 9.9% 8.2% 5.6% 10.7% 9.3% 4.6%	63 94 163 158 204 153 124 92 165 142 <u>71</u> 1,429 \$26,016 \$31,560	4.4% 6.6% 11.4% 11.1% 14.3% 10.7% 8.7% 6.4% 11.5% 9.9% 5.0%

Source: Rural and Rural Farm Population: 1988, USDA, US Dept. Commerce

TABLE 19. Type of income, number of households, and percent of households, Midwest farms, 1979.

Type of Income	Number	Percent
Wage and Salary Non-farm Self-employment Farm Self-employment Interest, Dividend, or Net Rental Social Security	589,331 116,847 673,018 532,974 246,529	63.8% 12.7% 72.9% 57.7% 26.7%
Public Assistance Other Number of households	24,634 136,612 923,041	2.7% 14.8%

Source: Census of Population, US Dept. Commerce

