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Department of Agriculture
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Seventh Annual Report of the Soil Conservation Farm Management Service
for the Year 1941

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INTRODUCTION

The Division of Agricultural Economics and the Division of Agricultural Extension of the University of Minnesota and the Soil Conservation Service of the United States Department of Agriculture have, since 1935, maintained a complete farm record service, for farmers in the Soil Conservation Areas of Southeastern Minnesota. In 1935 only farmers who were cooperating with the Soil Conservation Service and operating their farms under a complete erosion control program in the Gilmore Creek Area at Winona and the Deer-Bear Creek Area at Spring Valley were included. In 1936 the service was extended to include farmers cooperating with the Soil Conservation Service in the Beaver Creek Area at Caledonia. In 1939 the service was further extended to include cooperators in the Houston and Caledonia C.C.C. camp areas and also a considerable number of farmers who were not cooperating in erosion control with the Soil Conservation Service. In 1941 the service was made available in East Fillmore county to cooperators and non-cooperators of the Soil Conservation Service. A total of 102 records were closed in 1941.

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RECORDS KEPT

The records kept by the cooperators included inventories at the beginning and end of the year, cash receipts and expenses, a record of feed for the various classes of livestock, and a record of the farm produce used by the farm family. Complete household and personal records were also kept by 52 cooperators. Supplementary information was secured during the year regarding crop and livestock and production practices.

The cooperators were assisted and supervised during the year by the fieldman, Mr. Austin B. Sanford of the Operations Division, Soil Conservation Service, who checked the records several times during the year for accuracy, completeness, and comparability. At the end of the year the records were completed and closed by C. Herman Welch, Jr., and Kenneth Ogren of the Economics Division, Soil Conservation Service, and George V. Bowers and Austin B. Sanford of the Operations Division. The records were then brought to University Farm where they were checked and summarized under the direction of G. A. Pond, T. R. Nodland, and G. E. Toben of the Division of Agricultural Economics of the University of Minnesota, who prepared this report.

The account books were furnished by the Agricultural Extension Division of the University of Minnesota. S. B. Cleland of this division handled the field organization and was assisted in securing the cooperation of the record-keeping farmers by Francis Brady, county agricultural agent of Houston county, and Walter Thompson, county agricultural agent of Fillmore county.

TYPE OF FARMING

Agriculture in the areas covered by this report centers primarily around the dairy enterprise with smaller proportions of hogs, poultry, beef cattle, and sheep included. Dairy products were sold principally as cream, although a few farmers had an outlet for whole milk. In those cases where cream was sold, the skim milk was fed to the calves, hogs and poultry.

The principal crops grown were oats, barley, hay, and corn. The proportion of total farm land devoted to crop production and rotation pasture land varies from 30 per cent on some of the rougher farms in Houston county to more than 85 per cent on some of the more level farms in the West Fillmore Area, with an average of 61 per cent for all farms studied. Approximately 30 per cent of the farm acreage is devoted to permanent pasture, and about 8 per cent is in protected woodlots.

TOPOGRAPHY AND SOILS

Houston county, in which 67 records were completed, is located in the southeastern corner of the state. Most of the southwestern quarter of the county, in which somewhat more than one-half of the cooperating farmers are located, is undulating and moderately rolling. Productive forest and prairie soils (Fayette silt loam and Tama silt loam), mostly tillable, occupy about 75 per cent of this area. These areas are subject to some erosion. The remaining land in this area is generally too steep to till, but is satisfactory for grazing. Some of the hillsides are wooded. The remainder of the county is undulating to hilly. The Root River and other streams have cut numerous deep valleys with shallower tributaries. The soil on the ridges (Fayette silt loam) is quite productive. The soil below the most level part of the ridges (Dubuque silt loam) is less productive and is more subject to erosion. The valley floors represent excellent corn land, but frequent overflows reduce its value for other crops. Considerably more than half of the land is too steep to be tillable, much so steep as to be of limited value for grazing. The steepest north-facing slopes are covered with wood. The lime content of the soils throughout the county is

too low for the satisfactory production of alfalfa and sweet clover. Out-crops of limestone of suitable quality for application to the soil occur in many parts of the county.

East Fillmore county, in which 21 records were completed, has topography and soils similar to Houston county.

In the West Fillmore county area, in which 14 records were completed, the topography varies from very gently rolling to almost level land, in the upper part of the area, to very steep, hilly and rough land in the lower end. In many cases the upper end of the area lacks sufficient undulation of surface to allow proper drainage, in contrast to the lower, where creeks have cut deeply into the underlying limestone. The entire area has been glaciated almost equally between soils composed of drift material and of loessial mantle overdrift. Carrington and Lindley silt loam soils with glacial drift derivation and Tama and Clinton silt loams with loess derivation are among the more important soil types of the area. Erosion varies from slight amounts of sheet erosion in the upper reaches of the drainage areas to severe sheet and gully erosion in the middle and lower parts of the area.

SOIL CONSERVATION PRACTICES

Sixty-nine of the 102 farms included in this report were operated under a soil conservation program in cooperation with the Soil Conservation Service. Adjustments in land use made on these farms during 1941 included the shifting of 93 acres of cropland to permanent pasture on 11 farms and planting of 22 acres to trees on 7 farms. On 10 farms 70 acres of land that was in permanent pasture were plowed for crops and on 9 farms 28 acres were planted to trees.

Conservation measures practiced in 1941 included 852 acres of contour tillage on 23 farms, 2,285 acres of contour strips on 47 farms and 278 acres of terraced cropland on 12 farms. The use of wide grassed waterways was reported by 52 farmers. During the year 50 ditches or gullies were controlled on 16 farms, 410 rods of diversion ditches or dykes were built on 12 farms, and 11 rods of streambank were protected on two farms.

WEATHER

An unusually wet spring seriously delayed the seeding of small grain. However, warm weather and frequent rains during May and June favored the rapid growth of crops. Corn cultivating and haying were delayed by wet weather. July and August were hot and dry. Small grains suffered and pastures were severely damaged, especially in the southern half of Houston county. A late fall permitted most of the farmers to get their field work completed.

Table 1. Summary of Farm Inventories (Beginning of Year), 1941

Items	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
Size of farm (acres)	_____	243.0	309.2	165.2
Size of business (work units)*	_____	507	663	357
Horses	$_____	$ 342	$ 461	$ 252
Productive livestock (total)	_____	2,479	4,024	1,500
Dairy and dual-purpose cows	_____	647	492	534
Other dairy & dual-purpose cattle	_____	409	367	328
Beef cattle (including feeders)	_____	842	2,117	323
Hogs	_____	395	708	308
Sheep (farm flock)	_____	93	161	50
Poultry (including turkeys)	_____	93	179	57
Crop, seed, and feed	_____	1,568	2,574	934
Mach. & equipment (total)	_____	1,795	2,580	1,254
Power mach. (f. share)	_____	739	1,083	528
Crop & gen. mach. (f. share)	_____	831	1,195	545
Livestock equip. & supplies	_____	225	302	181
Buildings, fences, etc.	_____	5,384	6,569	4,249
Land	_____	5,784	8,569	4,198
Total farm capital	$_____	$17,352	$24,777	$12,387

*Explanation of term: "Work units."

The total "work units" for any one farm is a measure of size of that farm business. It is the accomplishment of a farm worker in a ten-hour day working on crops and productive livestock and at average efficiency.

The number of work units for each animal and each acre of crops used in this report are listed as follows:

Item	Per	No. of Work Units	Item	Per	No. of Work Units
Dairy and dual-purpose cows	cow	14.5	Small grain	acre	.8
			Soybeans for grain	"	1.0
Other dairy and dual-purpose cattle	animal	4.4	Sugar beets	"	3.0
			Sweet corn	"	2.5
Beef breeding herd	unit*	4.0	Corn, husked	"	1.7
Sheep - farm flock		2.0	Corn, hogged	"	1.1
Hens	100 hens	28.0	Corn, shredded	"	2.8
Feeder cattle		.4	Corn, silage	"	2.1
Feeder sheep	100 lbs.	.5	Corn fodder	"	1.5
Hogs	produced	.3	Alfalfa hay	"	1.0
Turkeys		.7	Soybean hay	"	1.4
Canning peas	acre	2.0	Other hay crop	"	.6

*Animal unit represents one cow, one bull, one feeder steer or heifer, two head of other cattle, seven head of sheep, fourteen lambs, five hogs, ten pigs, 100 hens, or 1,400 lbs. turkeys produced.

Table 2. Summary of Farm Inventories (End of Year), 1941

Items	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
Horses	$_____	$ 300	$ 398	$ 216
Productive livestock (total)	_____	3,212	5,382	1,867
Dairy & dual-purpose cows	_____	721	557	603
Other dairy & dual-purpose cattle	_____	495	482	390
Beef cattle (including feeders)	_____	910	2,509	316
Hogs	_____	851	1,476	394
Sheep (farm flock)	_____	116	185	81
Poultry (including turkeys)	_____	119	173	83
Crop, seeds, and feed	_____	1,924	3,269	1,020
Mach. & equipment (total)	_____	1,997	2,906	1,305
Power mach. (farm share)	_____	846	1,231	546
Crop and gen. mach.	_____	905	1,342	569
Livestock equipment and supplies	_____	246	333	190
Buildings, fences, etc.	_____	5,402	6,594	4,196
Land	_____	5,784	8,569	4,199
Total farm capital	$_____	$18,619	$27,118	$12,803

Table 3. Summary of Amount of Livestock

Items	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
No. of horses	_____	3.7	4.5	3.1
No. of colts	_____	.9	1.4	.7
No. of dairy & dual-purpose cows	_____	11.7	10.3	9.3
Head of other dairy & dual-purpose cattle	_____	14.2	12.3	12.0
Head of cattle kept in beef breeding herd	_____	14.2	34.9	5.0
Pounds of feeder cattle produced	_____	1,570	3,796	373
Litters of pigs	_____	13.7	22.3	8.5
Pounds of hogs produced	_____	19,996	31,884	11,805
Head of sheep (2 lambs = 1 head)	_____	15.3	24.0	8.5
No. of hens	_____	96	91	72
Total no. of prod. livestock ani.units	_____	43.7	68.3	26.3
% of total that are dairy and dual-purpose cows	_____	32.0	16.7	38.2
% of total that are other dairy and dual-purpose cattle	_____	20.2	9.9	25.3
% of total that are in beef breeding herd	_____	16.2	33.2	8.7
% of total that are feeder cattle	_____	3.8	7.9	1.4
% of total that are sheep (farm flock)	_____	4.2	4.4	3.5
% of total that are hogs	_____	19.7	20.8	19.9
% of total that are turkeys	_____	1.3	5.6	.0
% of total that are hens	_____	2.6	1.5	3.0
Number of farms with tractors		84	19	12

Table 4. Summary of Farm Earnings (Cash Statement), 1941

Items	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
FARM EXPENSES				
Horses bought	$_____	$ 15	$ 20	$ 16
Dairy and dual-purpose cows bought	_____	14	29	24
Other dairy & dual-purpose cattle bought	_____	63	89	54
Beef cattle bought (including feeders)	_____	97	401	0
Hogs bought	_____	92	178	47
Sheep bought	_____	9	3	10
Poultry bought (including turkeys)	_____	53	131	26
Misc. crop expenses	_____	155	263	75
Feed bought	_____	554	1,289	288
Power mach. (farm share) (new)	_____	291	457	98
Power mach. (farm share) (upkeep)	_____	257	384	176
Custom work hired	_____	103	116	97
Crop and general mach. (new)	_____	194	331	99
Crop and general mach. (upkeep)	_____	34	59	23
Livestock equipment (new)	_____	55	86	33
Livestock equipment (upkeep)	_____	13	19	7
Misc. livestock expense	_____	36	73	23
Buildings and fencing (new)	_____	177	262	121
Buildings and fencing (upkeep)	_____	100	99	78
Hired labor	_____	261	455	109
Taxes	_____	277	378	171
Insurance	_____	22	28	18
General farm	_____	12	14	10
(1) Total farm purchases	$_____	$2,884	$5,164	$1,603
(2) Decrease in farm capital	_____	-	-	-
(3) Board furnished hired labor	_____	103	165	57
(4) Interest on farm capital	_____	899	1,297	630
(5) Unpaid family labor	_____	302	364	269
(6) Total farm expenses (Sum of (1) to (5))	_____	$4,188	$6,990	$2,559
FARM RECEIPTS				
Horses	_____	49	91	43
Dairy and dual-purpose cows	_____	127	98	128
Dairy products	_____	924	865	649
Other dairy and dual-purpose cattle	_____	285	358	182
Beef cattle (including feeders)	_____	645	1,707	186
Hogs	_____	1,702	2,738	1,055
Sheep and wool	_____	110	174	56
Poultry (including turkeys)	_____	287	1,038	100
Eggs	_____	202	242	143
Corn	_____	56	97	41
Small grain	_____	66	104	54
Other crops	_____	180	253	110
Power machinery sold	_____	93	184	12
Crop and general machinery sold	_____	33	78	5
Misc.	_____	77	157	24
Income from work off the farm	_____	155	174	162
Agricultural adjustment payments	_____	230	348	155
(7) Total farm sales	_____	$5,221	$8,706	$3,105
(8) Increase in farm capital	_____	1,257	2,341	416
(9) Farm prod. used in house + house rent	_____	535	632	432
(10) Total farm receipts (7) + (8) + (9)	_____	$7,013	$11,679	$3,953
(6) Total farm expenses	_____	4,188	6,990	2,559
(11) Operator's labor earnings (10) - (6)	_____	2,825	4,689	1,394

Table 5. Summary of Farm Earnings (Enterprise Statement), 1941 (A)

Items	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
EXPENSES AND NET DECREASES				
Total power	$_____	$ 503	$ 644	$ 381
Horses	_____	143	166	98
Tractor	_____	144	184	98
Truck	_____	33	48	30
Auto (farm share)	_____	100	152	81
Gas engine (farm share)	_____	6	8	3
Elec. plant or current (farm share)	_____	21	23	17
Hired power	_____	56	63	54
Crop and general machinery	_____	123	135	106
Livestock equipment	_____	43	67	30
Buildings, fencing and tiling	_____	168	221	170
Misc. productive livestock expense	_____	34	69	21
Labor	_____	694	1,019	461
Real estate taxes	_____	243	329	150
Personal property tax	_____	34	49	21
Insurance	_____	22	28	18
General farm	_____	12	14	10
Interest on farm capital	_____	899	1,297	630
(1) Total expenses & net decreases	_____	2,775	3,872	1,998
RETURNS AND NET INCREASES				
All productive livestock	_____	5,047	8,131	2,978
Dairy and dual-purpose cows	_____	1,101	970	852
Other dairy & dual-purpose cattle	_____	468	489	374
Beef breeding herd	_____	538	1,382	131
Feeder cattle	_____	202	530	36
Hogs	_____	2,111	3,381	1,230
Sheep--farm flock	_____	126	195	77
Turkeys	_____	195	902	0
Chickens	_____	306	282	278
Crops, seed and feed	_____	55	-205	10
Income from work off the farm	_____	155	174	162
Agricultural conservation payments	_____	230	348	155
Miscellaneous	_____	113	113	87
(2) Total returns & net increases	_____	5,600	8,561	3,392
(1) Total expenses & net decreases	_____	2,775	3,872	1,998
(3) Oper. labor earnings (2) - (1)	_____	2,825	4,689	1,394

(A) Cash receipts and expenses are adjusted for changes in inventory for each enterprise and for each item of expense in order to show total receipts and net increases, and total expenses and net decreases. The operator's labor earnings are the same as those in page 6.

ANALYSIS OF THE REASONS FOR DIFFERENCES IN OPERATOR'S EARNINGS

The operator's labor earnings varied widely among the farmers included in this study. The average labor earnings of those farmers ranking in the upper 20 per cent in the range according to earnings was $4,689 and of those in the lower 20 per cent was $1,394. This is a range of $3,295 between the average earnings of these two groups. Some of the causes for these differences in earnings may be beyond the control of the farmer. However, all of these farmers could make some changes in their farming operations which would increase earnings. A farmer can secure some ideas as to changes that could profitably be made on his farm by studying the facts about his business as presented in this report and comparing his accomplishments with other farmers following the same general type of farming. The more important management factors affecting earnings and their relationships with earnings are presented in the following tables.

Table 6. Relation of Crop Yields to Farm Earnings

Per cent crop yields were of the average for all 102 farms		No. of	Average operator's
Group	Average	farms	labor earnings
Below 85	76	23	$2,148
85-114	100	56	2,990
115 and above	128	23	3,097

High production per acre, up to certain limits, tends to lower the cost per bushel of grain or per ton of hay. Any possible method of management that will increase crop yields and therefore lower cost of production more than the extra expense incurred in securing the higher yields should be given consideration. As a rule, plowing under legumes and manure and control of erosion tend to increase crop yields on these farms.

Table 7. Relation of Choice of Crops to Farm Earnings

Per cent of tillable land in high return crops*		No. of	Average
Group	Average	farms**	earnings
Below 27	22.1	13	$2,567
27 to 41	34.7	43	2,869
42 and above	46.2	19	2,831

*Crops are marked on page 14 as (A), (B), (C), or (D). All of the acres in (A) crops, one-half of acres in (B) crops, and one-fourth of acres in (C) crops are used in calculating per cent of tillable land in high return crops.

**Farms with less than 20 per cent of the total productive work units expended on crops were not included.

As a rule, on these farms, such crops as alfalfa, sweet clover, red clover, corn, barley, winter wheat, and flax bring a higher net return per acre than other crops usually grown. Additions can be made to earnings by putting a greater percentage of the tillable land into these higher return crops.

Soil erosion and fertility maintenance are vital problems on the farms included in this study. Biennial and perennial legumes, especially alfalfa and sweet clover, form a sod that helps to check erosion, conserve humus and soil fertility. If properly inoculated they tend to increase the nitrogen content of the soil. Legume hays and pastures are also valuable for feed, for they lessen the necessity to purchase high-priced protein feeds. Alfalfa is undoubtedly the most profitable crop available for these farms.

Table 8. Relation of Returns from Productive Livestock to Farm Earnings

Index of returns for $100 feed fed to productive livestock* Group	Average	No. of farms	Average earnings
Below 87	77	23	$2,559
87-121	100	61	2,918
122 and above	134	18	2,847

*The index is weighted by the number of animal units of each class of livestock.

The majority of these farms are dairy farms. However, in addition to the dairy herd there is quite an investment in other classes of productive livestock such as beef cattle, hogs, sheep or poultry. Most or all of the feed raised is fed on the farm and considerable additional feed is purchased. Feed is the major item of cost in livestock production and livestock constitute the major source of income on these farms. Hence there is a relationship between returns for $100 of feed and operator's labor earnings on these farms. There are a number of reasons for differences among farms in livestock returns. High productivity per animal and economy in the use of feed and labor are important. Other factors of considerable importance are kind of feed used, quality of pastures, balance of ration, degree of sanitation, and kind of shelter and equipment.

Table 9. Relation of Amount of Productive Livestock to Farm Earnings

Productive livestock units per 100 A. Group	Average	No. of farms	Average earnings
Below 17.0	13.9	24	$2,258
17.0 to 26.9	21.0	52	2,865
27.0 and above	32.7	26	3,265

On some farms the returns from livestock are so low that they do not cover feed and other costs. Such livestock is unprofitable, especially if there is more than enough to utilize what would otherwise be waste feed.

If the livestock is yielding a net return, an increased amount of livestock adds to size of business and the opportunity to increase the farm earnings. Livestock produces and aids in keeping up the fertility of the land, and utilizes waste products on the farm. Livestock also helps to provide productive employment throughout the year. Any method that aids in utilizing the available resources to full and efficient capacity should add to the farm income.

Table 10. Relation of Size of Business (work units) to Farm Earnings

No. of work units Group	Average	No. of farms	Average earnings
Below 375	311	21	$1,895
375 to 624	474	55	2,699
625 and above	734	26	3,839

Average farm earnings tend to increase with an increase in size of business where size of business is measured by days of productive work. However, for those farmers who are operating their farms at a loss, the larger the volume of business the larger will be the loss. On the other hand, a farmer who is making a profit, could make a larger profit if he increased his size of business, providing that in so doing he does not lower materially the efficiency in some one or more important branches of his business. Those farmers who have large businesses usually have more flexibility of their organization than does the man with a small business, and can utilize more efficiently and to better advantage available labor, power, machinery, and buildings.

Table 11. Relation of Amount of Work Accomplished per Worker to Farm Earnings

Work Units per Worker Group	Average	No. of farms	Average earnings
Below 200	172	19	$2,210
200 to 314	249	67	2,862
315 and above	354	16	3,396

More days of productive work accomplished per worker reduce the labor charge per unit of business. Higher labor accomplishment can be secured in several ways. In the first place the business must be large enough so that there will be at least sufficient work available for the family labor. The farm should be so organized that the labor requirements are well distributed throughout the year. Handling pastures in an efficient manner, in such a way that as large a proportion as possible of the year's feed for livestock may be obtained from them, helps to reduce labor requirements. Proper planning of the farm work, economical use of labor-saving machinery, etc., help to increase the work accomplished per worker.

Table 12. Relation of Power, Machinery and Building Expense to Farm Earnings*

Expense per work unit Group	Average	No. of farms	Average earnings
$2.20 and above	$2.60	20	$2,320
$1.20-2.19	1.63	62	2,939
Below $1.20	1.00	20	2,973

*Includes building, fencing, and all machinery expense, horse feed, and miscellaneous horse expense.

The expense factor shows a higher relation with earnings when prices are very low than when they are high. Some farms are under-equipped. On a few farms, excessive expenses constitute the main factor causing earnings to be very low. Some of the cash expenses can be kept down by careful management. Oftentimes necessary repairs and improvements can be made by using the available farm labor rather than by hiring extra help. Repairs and overhauling should be done before spring work begins in so far as possible; or on rainy days or in other spare time during the summer. Reducing the number of horses to the minimum required for efficient operation of the farm, helps reduce the power expense. In some cases farmers can offset some or all of the power and machinery expense by using their equipment for outside work.

Effect of Well-Balanced Efficiency on Farm Profits

It is quite evident from this report that few farmers have a monopoly on efficiency. Quite often farm operators show efficient management in one part of the farm business, which is offset by poor results in other phases. These farmers get medium returns while those who fall down all along the line get the lowest returns, and on the other hand those few who can manage to attain high efficiency in all parts of their organization receive returns well above the average. This is well illustrated in Table 13.

Table 13. Relation of Operator's Labor Earnings to the Number of Factors in Which the Farmer Is Above the Average

No. of factors in which farm excels	No. of farms	Your farm	The length of the shaded lines are in proportion to the average operator's labor earnings	Average operator's earnings
One	9	_____	xxxxxxxxxxxxxxxxxxxxxx	$2,179
Two	25	_____	xxxxxxxxxxxxxxxxxxxxxxxxxx	2,455
Three	27	_____	xxxxxxxxxxxxxxxxxxxxxxxxxxxx	2,947
Four	21	_____	xxxxxxxxxxxxxxxxxxxxxxxxx	2,760
Five	15	_____	xxxxxxxxxxxxxxxxxxxxxxxxxxxxxx	3,357
Six or seven	5	_____	xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx	3,845

The array in Table 13 indicates that it will be worth-while for each cooperator to study carefully his ranking on pages 12 and 13, and learn his standing in respect to each of the above factors and the elements of strength and weakness in his farm business.

Table 14. Measures of Farm Organization and Management Efficiency, 1941

Measures used in chart on page 13	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
Operator's Labor Earnings	$_____	$2,824	$4,689	$1,394
(1) Crop yields*	_____	100	107	88
(2) % of tillable land in high return crops**	_____	36.5	35.1	38.6
(3) Ret. for $100 feed to prod. livestock***	_____	100	95	99
(4) Prod. livestock units per 100 acres****	_____	22.3	26.6	20.6
(5) Size of business - work units	_____	507	663	357
(6) Work units per worker	_____	251	258	206
(7) Pow., mach., equip. & bldg. exp. per work unit	$_____	$1.70	$1.61	$1.95
Measures and items related to some of the above measures:				
(3) Index of return for $100 feed from -				
Dairy cattle	_____	100	88	108
Dual-purpose cattle	_____	100	92	98
Beef breeding herd	_____	100	96	96
Feeder cattle	_____	100	86	75
Hogs	_____	100	100	95
Sheep - farm flock	_____	100	89	101
Turkeys	_____	100	103	-
Chickens	_____	100	97	100
(5) Work units on crops	_____	120	172	80
Work units on productive livestock	_____	347	448	236
Other work units	_____	40	43	41
(6) Total number of workers	_____	2.1	2.6	1.7
Number of family workers	_____	1.5	1.7	1.4
Number of hired workers	_____	.6	.9	.3
(7) Power expense per work unit	$_____	$1.02	$ .97	$1.07
Crop machinery expense per work unit	_____	.25	.20	.31
Livestock equip. expense per work unit	_____	.09	.10	.09
Bldgs. and fencing exp. per work unit	_____	.34	.34	.48

*Given as a percentage of the average.

**Crops are marked on page 14 as (A), (B), (C), and (D). All of acres in (A) crops, one half of acres in (B) crops, and one-fourth of acres in (C) crops are used in calculating per cent of tillable land in high return crops.

***An index weighted by the animal units of livestock.

****Acres in timber not pastured, roads, waste, and farmstead were not included.

Thermometer Chart

Using your figures from page 12 locate your standing with respect to the various measures of farm organization and management efficiency. The averages for the 102 farms included in this summary are located between the dotted lines across the center of this page.

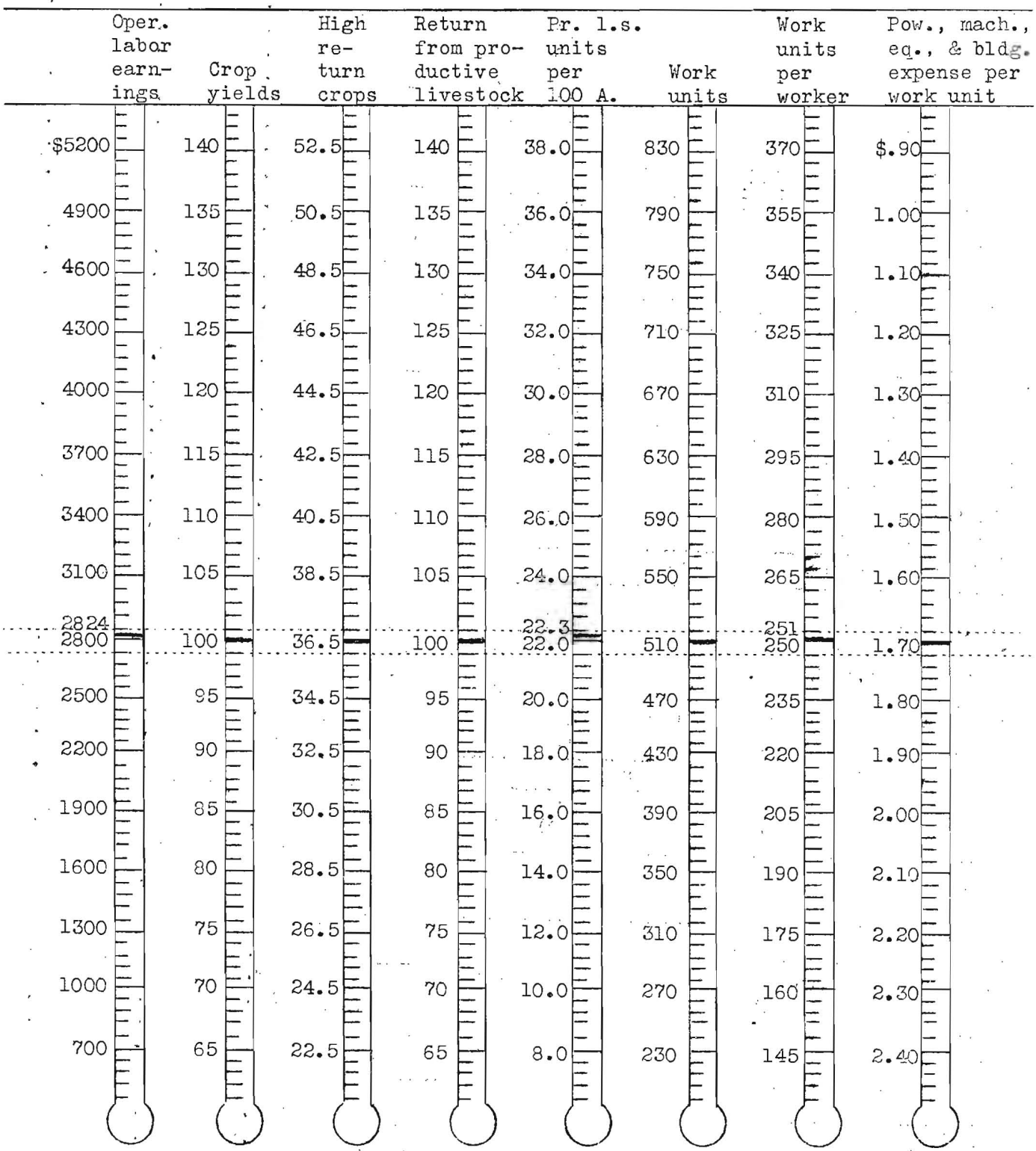

Table 15. Distribution of Acres in Farm, 1941

Crop: (A) (B) (C) and (D) refer to ranking used in calculating % of tillable land in High Return Crops (see page 12)		No. growing this crop	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
Flax	(B)	13		1.6	3.0	1.8
Barley	(B)	46		5.2	9.8	2.8
Winter wheat	(B)	9		.4	.4	.7
Spring wheat	(C)	30		1.6	1.9	1.1
Oats and barley	(C)	62		15.0	21.3	12.8
Oats and wheat	(C)	13		2.4	2.7	1.3
Oats	(D)	69		14.5	22.7	7.9
Soybeans for grain	(D)	26		2.6	5.1	2.4
Miscellaneous	(D)	6		.3	.0	.3
Total small grain and peas		101		43.6	66.9	31.1
Hybrid seed corn and truck crops	(A)	41		.9	.2	.1
Corn grain	(B)	102		23.1	36.6	15.2
Corn silage	(C)	61		4.5	5.1	2.9
Corn fodder	(D)	8		.6	.9	.7
Total cultivated crops		102		29.1	42.8	18.9
Alfalfa hay	(A)	88		13.2	17.4	11.1
Red clover hay	(B)	62		10.6	19.3	4.7
Soybean hay	(C)	23		1.1	.7	1.8
Mixed legumes and non-legumes	(C)	37		7.7	7.6	6.2
Legumes for seed	(C)	8		.6	1.2	.0
Timothy and/or brome	(D)	28		2.6	6.6	.1
Timothy seed	(D)	19		1.6	3.2	.1
Other annual hay	(D)	3		.1	.0	.1
Total tillable land in hay		102		37.5	56.0	24.1
Alfalfa pasture	(A)	15		.8	1.1	1.3
Sweet clover pasture	(B)	19		2.2	3.9	1.7
Mixture incl.alf., sw.clover, brome	(B)	25		4.0	2.4	6.5
Other legumes and mixtures	(C)	46		9.0	12.3	3.8
Sudan grass and/or rape pasture	(C)	15		.8	2.4	.2
Other tillable pasture	(D)	48		10.8	15.7	4.1
Total tillable land in pasture		95		27.6	37.8	17.6
Tillable land not cropped	(D)	20		1.3	1.1	2.3
Total tillable land				139.1	204.6	94.0
Wild hay (non-tillable)		13		.7	.7	.6
Non-tillable pasture		101		72.0	70.9	43.3
Timber (not pastured)		77		20.6	19.5	17.7
Roads and waste				6.4	8.0	5.9
Farmstead				4.2	5.5	3.7
Total acres in farm				243.0	309.2	165.2
% land tillable				60.5	66.5	59.5
% tillable land in high return crops				36.5	35.1	38.6

Table 16. Crop Yields per Acre, 1941

Crop	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
Flax, bu.	_____	9.8	8.9	7.5
Barley, bu.	_____	29.2	31.0	25.3
Winter wheat, bu.	_____	10.1	12.2	12.4
Spring wheat, bu.	_____	12.7	11.1	13.6
Oats and barley, bu.	_____	32.7	34.4	24.7
Oats and wheat, bu.	_____	30.0	-	-
Oats, bu.	_____	31.5	34.7	27.5
Soybeans for grain, bu.	_____	15.7	19.6	14.7
Hulless oats, bu.	_____	9.3	-	-
Potatoes, bu.	_____	89.6	-	-
Corn, grain, bu.	_____	58.6	62.3	48.2
Corn silage, tons	_____	9.4	9.7	7.2
Corn or cane fodder, tons	_____	2.4	-	-
Alfalfa hays, tons	_____	2.7	2.7	2.6
Red clover hay, tons	_____	2.5	2.6	2.2
Soybean hay, tons	_____	1.8	1.9	1.8
Mixed legume and non-legume hay, tons	_____	1.7	1.8	1.6
Legume seed, lbs.	_____	89.	-	-
Timothy and/or brome hay, tons	_____	1.4	1.1	-
Timothy seed, lbs.	_____	149.	165.	-
Other annual hay, tons	_____	1.9	-	-
Wild hay, tons	_____	.7	.7	.7

Table 17. Feed Costs for Horses and Misc. Power and Machinery Expense, 1941

Items	Your farm	Average of 100 farms*	19 most profitable farms*	20 least profitable farms
Feed per horse,** lbs.:				
Grain	_____	1,231	1,412	741
Hay	_____	3,914	3,609	3,191
Fodder and stover	_____	195	55	305
Feed costs per horse:				
Grain	$_____	$12.70	$15.04	$ 7.40
Roughage	_____	14.75	13.39	12.35
Pasture	_____	4.42	3.63	5.02
TOTAL FEED COSTS	$_____	$31.87	$32.06	$24.77
Number of work horses	_____	3.7	4.7	3.1
Number of colts	_____	1.0	1.5	.7
Crop acres per farm***	_____	110.9	166.4	74.7
Tractor and horse exp. per crop acre***	$_____	$2.72	$2.15	$2.65
Crop and general machinery exp. per crop acres***	_____	1.22	.82	1.43

*Two farms did not have horses.
**Two colts equal one horse.
***Averages of 102 farms.

Table 18. Factors of Cost and Returns from Dairy Cows, 1941

Items	Your farm	Average of 44 farms	9 farms highest in butterfat per cow	9 farms lowest in butterfat per cow
Pounds of butterfat per cow	_____	223	286	162
Feeds per cow, lbs.:				
Corn	_____	556	1,120	235
Small grain	_____	777	789	442
Com. feeds - under 25% protein	_____	25	48	13
Com. feeds - over 25% protein	_____	75	131	19
Legume hay	_____	2,936	4,288	2,068
Other hay	_____	526	749	505
Fodder and stover	_____	383	287	605
Total concentrates	_____	1,433	2,088	709
Total dry roughage	_____	3,845	5,324	3,178
Silage	_____	2,848	3,948	1,622
Total digestible nutrients*	_____	3,470	4,973	2,335
T.D.N. per lb. B.F.	_____	15.5	17.4	14.8
% T.D.N. that is protein	_____	14.0	14.5	13.1
Feed cost per cow:				
Concentrates	$_____	$14.78	$21.74	$ 6.97
Roughages	_____	18.75	27.38	13.38
Pasture	_____	6.44	6.11	6.49
TOTAL FEED COSTS	$_____	$39.97	$55.23	$26.84
Value of produce per cow:				
B.F. sales	$_____	$76.29	$107.15	$54.85
Dairy produce used in house	_____	7.49	6.29	5.41
Milk to livestock	_____	13.41	13.93	9.74
Net increases in value of cows	_____	4.32	4.59	4.01
TOTAL VALUE PRODUCED	$_____	$101.51	$131.96	$74.01
RETURNS ABOVE FEED COST PER COW	$_____	$61.54	$76.73	$47.17
RETURNS FOR $100 OF FEED	$_____	$272	$245	$303
Price received per lb. B.F. sold				
As manufacturing cream (cents)	_____	37.8	36.8	38.3
As mkt. mk. & cm. & mk. for cheese (cts.)	_____	53.5	49.8	51.6
Feed cost per lb. B.F. (cents)	_____	17.9	19.3	17.1
% fall freshening	_____	40	53	23
Number of dairy cows**	_____	13.6	14.4	12.6

*Not including nutrients received from pasture.

**All dairy cows which have at some time in the past freshened are included in the dairy herd, and affect the average number of cows used in computing this table. There is some variation in the number of months of dry period per cow; however, this variation is small for the majority of farms.

Table 19. Feed Costs and Returns from Other Dairy Cattle, 1941

Items	Your farm	Average of 39 farms*	8 farms highest in butterfat per cow*	8 farms lowest in butterfat per cow*
Feeds per head, lbs.:				
Concentrates	_____	292	398	70
Hay and fodder	_____	1,504	1,755	1,639
Silage	_____	1,110	1,378	460
Whole milk	_____	428	284	478
Skim milk	_____	1,287	1,414	1,220
Feed cost per head:				
Concentrates	$_____	$ 3.10	$ 4.44	$ .88
Roughages	_____	7.31	9.32	6.35
Milk	_____	9.25	7.20	10.08
Pasture	_____	1.96	1.75	2.20
TOTAL FEED COSTS	$_____	$21.62	$22.71	$19.51
Net inc. in value of other dairy cattle	$_____	$34.23	$39.73	$29.82
RETURNS ABOVE FEED COST PER HEAD	$_____	$12.61	$17.02	$10.31
RETURNS FOR $100 OF FEED	$_____	$175	$188	$171
Number of head of other dairy cattle	_____	12.9	14.4	12.4

Table 20. Feed Costs and Returns from All Dairy Cattle

Items	Your farm	Average of 44 farms	9 farms highest in butterfat per cow	9 farms lowest in butterfat per cow
Feeds per animal unit, lbs.:				
Concentrates	_____	1,205	1,753	619
Hay and fodder	_____	3,537	4,655	3,356
Silage	_____	2,518	3,390	947
Feed cost per animal unit:				
Concentrates	$_____	$12.49	$18.30	$ 6.21
Roughages	_____	17.02	23.86	13.31
Pasture	_____	5.63	5.31	6.01
TOTAL FEED COSTS	$_____	$35.14	$47.47	$25.53
Value of produce per animal unit:				
Dairy products	$_____	$63.18	$85.96	$47.27
Net increase in value of dairy cattle	_____	22.46	25.28	16.63
TOTAL VALUE PRODUCED	$_____	$85.64	$111.24	$63.90
RETURNS ABOVE FEED PER ANIMAL UNIT	$_____	$50.50	$63.77	$38.37
RETURNS FOR $100 OF FEED	$_____	$261	$242	$281
Animal units of dairy cattle	_____	19.7	21.2	19.6

*Several farmers having both a dairy and a beef herd used a beef bull and included all the young stock in the beef herd.

Table 21. Factors of Cost and Returns from Dual-Purpose Cows, 1941

Items	Your farm	Average of 40 farms	8 farms highest in butterfat per cow	8 farms lowest in butterfat per cow
Pounds of butterfat per cow	_____	191	255	134
Feeds per cow, lbs.:				
Corn	_____	439	686	197
Small grain	_____	567	1,059	269
Com. feeds - under 25% protein	_____	18	2	0
Com. feeds - over 25% protein	_____	43	58	17
Legume hay	_____	2,628	3,610	2,090
Other hay	_____	479	82	437
Fodder and stover	_____	373	232	320
Total concentrates	_____	1,067	1,805	483
Total dry roughage	_____	3,480	3,924	2,847
Silage	_____	3,452	3,601	1,189
Total digestible nutrients*	_____	3,092	3,944	1,954
T.D.N. per lb. B.F.	_____	16.1	15.3	14.9
% T.D.N. that is protein	_____	13.5	14.4	14.5
Feed cost per cow:				
Concentrates	$_____	$11.06	$18.47	$ 4.82
Roughages	_____	17.90	21.27	13.32
Pasture	_____	6.40	6.23	6.43
TOTAL FEED COSTS	$_____	$35.36	$45.97	$24.57
Value of produce per cow:				
B.F. sales	$_____	$62.07	$83.68	$40.20
Dairy produce used in house	_____	7.14	9.82	7.23
Milk to livestock	_____	13.13	17.63	10.43
Net increases in value of cows	_____	5.53	10.00	3.80
TOTAL VALUE PRODUCED	$_____	$87.87	$121.13	$61.66
RETURNS ABOVE FEED COST PER COW	$_____	$52.51	$75.16	$37.09
RETURNS FOR $100 OF FEED	$_____	$262	$276	$260
Price received per lb. B.F. sold				
As manufacturing cream (cents)	_____	38.1	37.8	38.6
As whole milk or market cream (cents)	_____	51.0	50.3	-
Feed cost per lb. B.F. (cents)	_____	18.6	17.9	18.5
% fall freshening	_____	38	47	29
Number of dual-purpose cows	_____	14.9	12.2	15.3

*Not including nutrients received from pasture.

Table 22. Feed Costs and Returns from Other Dual-Purpose Cattle, 1941

Items	Your farm	Average of 37 farms*	8 farms highest in returns above feed	8 farms lowest in returns above feed
Feeds per head, lbs.:				
Concentrates	_____	428	614	681
Hay and fodder	_____	1,404	1,398	1,704
Silage	_____	952	530	960
Whole milk	_____	268	343	175
Skim milk	_____	1,098	1,221	923
Feed cost per head:				
Concentrates	$_____	$4.43	$6.48	$6.99
Roughages	_____	6.16	5.64	7.12
Milk	_____	6.53	7.98	4.66
Pasture	_____	2.50	2.22	2.32
TOTAL FEED COSTS	$_____	$19.62	$22.32	$21.09
Net increase in value	$_____	$33.58	$52.45	$24.11
RETURNS ABOVE FEED COST PER HEAD	$_____	$13.96	$30.13	$ 3.02
RETURNS FOR $100 OF FEED	$_____	$180	$255	$116
No. of head other dual-purpose cattle	_____	25.4	25.5	33.4

Table 23. Feed Costs and Returns from All Dual-Purpose Cattle

Items	Your farm	Average of 40 farms	8 farms highest in returns above feed	8 farms lowest in returns above feed
Feeds per animal unit, lbs.:				
Concentrates	_____	973	1,194	750
Hay and fodder	_____	3,157	2,742	3,740
Silage	_____	2,792	2,257	3,339
Feed cost per animal unit:				
Concentrates	$_____	$10.09	$12.43	$7.46
Roughages	_____	15.41	14.26	17.19
Pasture	_____	5.81	5.82	5.84
TOTAL FEED COSTS	$_____	$31.31	$32.51	$30.49
Value of produce per animal unit:				
Dairy products	$_____	$43.38	$57.66	$28.75
Net increase in value	_____	29.68	36.45	25.76
TOTAL VALUE PRODUCED	$_____	$73.06	$94.11	$54.51
RETURNS ABOVE FEED PER ANIMAL UNIT	$_____	$41.75	$61.60	$24.02
RETURNS PER $100 OF FEED	$_____	$243	$302	$184
Animal units of dual-purpose cattle	_____	27.0	24.3	33.0

*Several farmers having both a dual-purpose and a beef herd used a beef bull and included all the young stock in the beef herd.

Table 24. Feed Costs and Returns from Beef Cattle, 1941

Items	Your farm	Average of all farms	Farms highest in returns above feed	Farms lowest in returns above feed
Beef breeding herd: no. of farms:		28	8	8
Feeds per animal unit, lbs.:				
Concentrates	_____	846	1,062	704
Legume hay	_____	1,757	1,631	2,262
Other hay	_____	511	307	854
Fodder and stover	_____	314	354	584
Silage	_____	1,938	2,130	429
Skim milk*	_____	116	0	237
Whole milk*	_____	44	47	71
Feed cost per animal unit:				
Concentrates	$_____	$8.61	$10.67	$7.31
Roughages	_____	12.29	11.41	13.85
Milk	_____	.94	.78	1.53
Pasture	_____	6.38	5.72	6.64
TOTAL FEED COSTS	$_____	$28.22	$28.58	$29.33
Value of produce per animal unit:				
Dairy products	$_____	$12.13	$22.57	$6.05
Net increase in value of animals	_____	42.55	54.70	28.14
TOTAL VALUE PRODUCED	$_____	$54.68	$77.27	$34.19
RETURNS ABOVE FEED COST PER ANIMAL UNIT	$_____	$26.46	$48.69	$4.86
RETURNS FOR $100 OF FEED	$_____	$207	$284	$123
Number of cows and herd bulls	_____	20.8	20.2	20.1
Number of animal units in the herd	_____	36.2	36.2	34.9
Feeder cattle: no. of farms:		22	7	7
Feeds per cwt. beef produced, lbs.:				
Corn	_____	476	454	666
Small grain	_____	75	42	147
Com. feeds - under 25% protein	_____	0	0	0
Com. feeds - over 25% protein	_____	22	13	21
Legume hay	_____	278	224	393
Other hay	_____	66	48	65
Fodder and stover	_____	67	90	33
Total concentrates	_____	573	509	834
Total dry roughages	_____	411	362	491
Silage	_____	146	217	93
Feed cost per cwt. beef produced:				
Concentrates	$_____	$5.61	$4.84	$8.12
Roughages	_____	1.73	1.63	2.06
Pasture	_____	.25	0	.19
TOTAL FEED COSTS	$_____	$7.59	$6.47	$10.37
Net increase in value of feeders	$_____	$12.23	$14.50	$11.60
RETURNS ABOVE FEED COST PER CWT. BEEF PROD.	$_____	$4.64	$8.03	$1.23
RETURNS FOR $100 OF FEED	$_____	$183	$243	$113
Price received per cwt. beef sold	$_____	$9.33	$8.97	$9.70
Price paid per cwt. beef bought (4 cases)	_____	8.92	-	-
No. of animal units of feeder cattle	_____	11.4	6.0	11.1
Pounds of beef produced	_____	7,126	4,494	6,935

*Several farmers had both dairy or dual-purpose cows and beef cows and fed considerable amounts of milk produced by the dairy herd to beef calves.

Table 25. Feed Costs and Returns from Hogs and Sheep, 1941

Items	Your farm	Average of all farms	Farms highest in returns above feed	Farms lowest in returns above feed
Hogs: no. of farms:		102	20	20
Feed per cwt. hogs produced, lbs.:				
Corn		301	254	356
Small grain		123	76	184
Com. feeds - under 25% protein		2	3	2
Com. feeds - over 25% protein		12	8	16
Total concentrates		438	341	558
Skim milk, buttermilk, and whey		198	225	227
Feed cost per cwt. hogs produced:				
Concentrates	$	$4.60	$3.56	$5.86
Skim milk, buttermilk, and whey		.35	.40	.41
Pasture		.25	.24	.25
TOTAL FEED COSTS	$	$5.20	$4.20	$6.52
Net increase in value per cwt. hogs prod.	$	$10.57	$11.09	$10.16
RETURNS ABOVE FEED COST PER CWT. HOGS PROD.	$	$5.37	$6.89	$3.64
RETURNS FOR $100 OF FEED	$	$212	$267	$162
Price received per cwt. hogs sold	$	$9.23	$9.39	$8.92
Total no. of litters raised		13.7	12.2	12.4
No. of pigs weaned per litter		6.6	6.4	6.9
Per cent 2-litter system		36.9	33.4	34.7
Pounds of hogs produced		19,996	17,973	18,478
Sheep (farm flock): no. of farms:		33	11	11
Feeds per head*, lbs.:				
Concentrates		57	47	53
Legume hay		189	108	272
Other hay		23	13	31
Fodder and stover		12	4	33
Silage		110	36	155
Feed cost per head:				
Concentrates	$	$ .58	$ .48	$ .52
Roughages		1.09	.53	1.63
Pasture		1.05	1.13	1.00
TOTAL FEED COSTS	$	$2.72	$2.14	$3.15
Value of produce per head:				
Wool	$	$2.93	$2.81	$2.91
Net increase in value of sheep		5.51	8.00	3.30
TOTAL VALUE PRODUCED	$	$8.44	$10.81	$6.21
RETURNS ABOVE FEED COST PER HEAD	$	$5.72	$8.67	$3.06
RETURNS FOR $100 OF FEED	$	$351	$530	$209
Value per lamb sold	$	$8.63	$8.65	$8.62
Price per lb. wool sold (cents)		41.7	41.5	41.7
Pounds of wool per sheep sheared		8.2	8.5	7.6
Number of ewes kept for lambing		29.2	24.1	31.2
% lamb crop		109.4	110.5	101.9
% death loss		16.2	14.6	18.2
No. of head of sheep*		46.4	38.5	49.0

*Two lambs under six months of age considered as one head.

Table 26. Feed Costs and Returns from Poultry, 1941

Items	Your farm	Average of all farms	Farms highest in returns above feed	Farms lowest in returns above feed
Chickens: no. of farms:		88	18	18
Feed per hen, lbs.:				
Grain		99	114	115
Commercial feeds		19	33	16
Total concentrates		118	147	131
Skim milk and buttermilk		35	27	27
Feed cost per hen:				
Concentrates	$	$1.55	$2.04	$1.63
Skim milk and buttermilk		.06	.05	.05
TOTAL FEED COST	$	$1.61	$2.09	$1.68
Value of produce per hen:				
Eggs sold and used in house	$	$2.08	$2.76	$1.49
Net increase in value of chickens		1.01	2.33	.31
TOTAL VALUE PRODUCED	$	$3.09	$5.09	$1.80
RETURNS ABOVE FEED COST PER HEN	$	$1.48	$3.00	$ .12
RETURNS FOR $100 OF FEED	$	$208	$268	$116
Price received per doz. eggs sold (cts.)		20.6	21.6	19.9
Eggs laid per hen		120	153	90
No. of hens		109	125	92
% of hens that are pullets		67	70	61
Turkeys: no. of farms:		6		
Feed per cwt. turkeys produced, lbs.:				
Grain		325		
Com. feeds - under 25% protein		14		
Com. feeds - over 25% protein		192		
Total concentrates		531		
Skim milk		14		
Feed cost per cwt. turkeys produced	$	$9.61		
Value of produce per cwt. turkeys prod.:				
Eggs and poults	$	$1.26		
Net increases in turkeys		18.45		
TOTAL VALUE PRODUCED	$	$19.71		
RETURNS ABOVE FEED COST PER CWT. TURKEYS PRODUCED	$	$10.10		
RETURNS FOR $100 OF FEED	$	$209		
Price received per lb. turkeys sold (cts.)		20.2		
Pounds of turkeys produced		16,397		

Table 27. Family Living from the Farm, 1941

Items	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms	Your farm	Average of 102 farms	20 most profitable farms	20 least profitable farms
Adult)Family	_____	3.4	3.8	2.7				
equivalent)Other*	_____	.5	.7	.3				
Whole milk	_____	861	809	593	$_____	$ 31.21	$ 29.22	$ 22.64
Skim milk	_____	788	1,180	512	_____	4.36	6.84	1.98
Cream	_____	388	442	302	_____	42.06	48.08	34.10
Farm-made butter	_____	33	65	28	_____	13.04	25.88	11.16
Eggs	_____	143	169	119	_____	29.61	34.97	24.94
Cattle	_____	432	545	284	_____	29.74	44.04	18.44
Hogs	_____	545	631	454	_____	45.60	52.34	36.40
Sheep	_____	11	3	7	_____	.79	.30	.29
Poultry	_____	74	46	74	_____	9.59	6.28	9.23
Potatoes	_____	22	27	17	_____	16.40	20.24	11.65
Vegetables & fruits					_____	54.27	72.77	40.34
Farm fuel	_____	14	18	13	_____	57.98	70.84	56.92
Rental val.of house					_____	200.82	219.72	164.13
Total					$_____	$535.47	$631.52	$432.22

Table 28. Household and Personal Expenses for Those Farms Which Kept Complete Accounts of These Expenses, 1941

Items	Your farm	Average of 52 farms	10 most profitable farms	10 least profitable farms
Number of persons - family	_____	4.4	4.2	3.5
Number of persons, (Family	_____	3.6	3.3	2.8
adult equivalent (Other*	_____	.4	.6	.4
Food and meals bought	$_____	$258	$273	$220
Operating and supplies	_____	71	89	56
Clothing and clothing materials	_____	129	157	75
Personal care, personal spending	_____	48	56	39
Furnishings and equipment	_____	80	99	25
Education, recreation and development	_____	63	121	34
Medical care and health insurance	_____	90	110	72
Church, welfare, and gifts	_____	57	82	34
Personal share of auto expense	_____	77	88	68
Household share of elect. & gas eng. exp.	_____	18	28	13
H.H. & pers.shr.of new auto,gas eng. & motors bought	_____	59	132	24
Life insurance and other investments	_____	265	1,193	27
Total household and personal cash expenses	$_____	$1,215	$2,428	$687
Food furnished by the farm	$_____	$281	$312	$225
Fuel furnished by the farm	_____	63	80	60
House rental	_____	198	198	162
Total household and personal expenses	$_____	$1,757	$3,018	$1,134

*Hired help or others boarded.

Table 29. Summary of Farm Earnings by Areas, 1941

Items	East Fillmore	West Fillmore	Houston County
Number of farms	21	14	67
FARM EXPENSES			
Horses bought	$21	$21	$13
Dairy and dual-purpose cows bought	8	4	19
Other dairy and dual-purpose cattle bought	59	129	50
Beef cattle bought (including feeders)	395	8	22
Hogs bought	97	210	66
Sheep bought (including feeders)	3	5	12
Poultry bought (including turkeys)	53	27	58
Misc. crop expenses	117	199	157
Feed bought	618	657	512
Power mach. (farm share) (new)	418	338	242
Power mach. (farm share) (upkeep)	287	296	239
Custom work hired	86	144	100
Crop and general mach. (new)	174	243	190
Crop and general mach. (upkeep)	37	43	32
Livestock equipment (new)	56	76	50
Livestock equipment (upkeep)	10	8	14
Misc. livestock expense	37	55	32
Buildings and fencing (new)	191	280	152
Buildings and fencing (upkeep)	79	118	103
Hired labor	296	289	244
Taxes	285	257	278
Insurance	24	18	22
General farm	11	16	11
(1) Total farm purchases	$3,362	$3,441	$2,618
(2) Decrease in farm capital	-	-	-
(3) Board furnished hired labor	151	97	89
(4) Interest on farm capital	946	1,067	850
(5) Unpaid family labor	246	319	316
(6) Total farm expenses (Sum of (1) to (5))	$4,705	$4,924	$3,873
FARM RECEIPTS			
Horses	$85	$27	$42
Dairy and dual-purpose cows	91	160	132
Dairy products	644	993	997
Other dairy and dual-purpose cattle	278	389	266
Beef cattle (including feeders)	1,615	530	364
Hogs	1,708	1,720	1,696
Sheep and wool (including feeders)	163	222	70
Poultry (including turkeys)	176	75	365
Eggs	214	253	187
Corn	26	108	55
Small grain	89	203	29
Other crops	109	241	190
Power machinery sold	121	135	76
Crop and gen. mach. sold	27	41	33
Misc.	74	103	73
Income from work off the farm	119	193	158
Agricultural adjustment payments	219	331	212
(7) Total farm sales	$5,758	$5,724	$4,945
(8) Increase in farm capital	1,468	1,290	1,185
(9) Family living from farm	600	561	510
(10) Total farm receipts (7) + (8) + (9)	$7,826	$7,575	$6,640
(6) Total farm expenses	4,705	4,924	3,873
(11) Operator's labor earnings (10) - (6)	$3,121	$2,651	$2,767

Table 30. Distribution of Acres in Farm and Average Yields per Acre by Areas, 1941

	Distribution of Acres			Crop Yields		
	East Fillmore	West Fillmore	Houston county	East Fillmore	West Fillmore	Houston county
Flax	1.6	6.9	.5	14.2 bu.	8.6 bu.	9.7 bu.
Barley	9.3	6.5	3.7	25.2 bu.	29.6 bu.	30.8 bu.
Winter wheat	1.0	.8	.2	11.5 bu.	-	9.2 bu.
Spring wheat	3.3	2.8	.7	11.4 bu.	15.6 bu.	11.8 bu.
Oats and barley	11.3	23.0	14.5	36.7 bu.	30.8 bu.	32.1 bu.
Oats and wheat	2.8	1.8	2.4	33.4 bu.	31.7 bu.	28.3 bu.
Oats	21.5	14.0	12.4	32.4 bu.	28.9 bu.	31.8 bu.
Soybeans for grain	4.2	9.9	.6	19.1 bu.	10.7 bu.	17.3 bu.
Miscellaneous	.0	.5	.3			
Total small grain	55.0	66.2	35.3			
Hybrid seed corn, truck crops, etc.	.3	.9	1.1			
Corn, grain	22.2	25.4	22.9	58.0 bu.	41.3 bu.	62.5 bu.
Corn, silage	4.3	8.0	3.8	10.6 tons	7.1 tons	9.7 tons
Corn fodder	1.3	1.8	.1	4.2 tons	1.8 tons	1.7 tons
Total cultivated crops	28.1	36.1	27.9			
Alfalfa hay	15.0	16.3	12.1	2.8 tons	2.4 tons	2.7 tons
Red clover hay	13.2	8.5	10.3	2.5 tons	1.8 tons	2.6 tons
Soybean hay	1.9	3.1	.5	1.9 tons	1.4 tons	1.9 tons
Mixed legumes and non-leg.	5.0	11.8	7.5	1.6 tons	1.4 tons	1.9 tons
Legumes for seed	.0	.8	.7	-	-	84 lbs.
Timothy and/or brome hay	1.8	5.7	2.3	1.6 tons	.7 tons	1.4 tons
Timothy seed	.7	1.7	1.8	132 lbs.	207 lbs.	139 lbs.
Other annual hay	.0	.1	.1			
Total till. land in hay	37.6	48.0	35.3			
Alfalfa pasture	1.0	.0	.9			
Sweet clover pasture	.6	3.5	2.5			
Mix.incl. alf., sw.cl., brome	3.8	10.6	2.7			
Other legumes and mixtures	8.7	4.9	9.8			
Sudan grass or rape	2.1	.0	.6			
Other tillable pasture	15.9	17.2	7.8			
Total till. land in past.	32.1	36.2	24.3			
Tillable land not cropped	1.0	.7	1.5			
Total tillable land	153.8	187.2	124.3			
Wild hay (non-tillable)	.5	.4	.9			
Non-tillable pasture	67.1	41.2	80.0			
Timber (not pastured)	14.0	11.7	24.5			
Roads and waste	5.5	4.6	7.0			
Farmstead	4.7	5.4	3.8			
Total acres in farm	245.6	250.5	240.5			
% land tillable	64.0	73.1	56.8			
% tillable land in high return crops	34.3	35.0	37.5			

Table 31. Miscellaneous Information Averaged by Areas, 1941

	East Fillmore	West Fillmore	Houston
FARM INVENTORIES (Beginning of year)			
Horses	$409	$402	$309
Productive livestock	3,139	3,182	2,125
Crops, seed and feed	1,591	2,061	1,457
Machinery and equipment	1,712	2,038	1,770
Buildings	5,765	6,103	5,115
Land	5,576	8,288	5,326
Total farm capital	$18,192	$22,074	$16,102
MEASURES OF FARM ORG. AND MANAGEMENT EFFICIENCY			
Index of crop yields	103	84	103
% tillable land in high return crops	34.3	35.0	37.5
Index of ret. for $100 feed to livestock	99	93	102
Productive livestock units per 100 acres	25.4	21.5	21.5
Size of business (work units)	473	575	503
Work units per worker	229	271	254
Mach., equip. and bldg. expense per work unit	$1.91	$1.89	$1.59
Work units on crops	123	161	111
Work units on productive livestock	314	365	353
Other work units	36	49	39
Total number of workers	2.1	2.1	2.0
Number of family workers	1.3	1.5	1.5
Number of hired workers	.8	.6	.5
AMOUNT OF LIVESTOCK			
Number of work horses	4.4	4.0	3.4
Number of colts	1.2	1.2	.8
Number of dairy and dual-purpose cows	6.0	12.7	13.3
Head of other dairy and dual-purpose cattle	9.6	17.2	15.0
Head in beef breeding herd	33.4	12.3	8.5
Pounds of beef produced	3,742	1,515	901
Litters of pigs raised	13.6	14.6	13.5
Pounds of hogs produced	19,536	19,716	20,198
Head of sheep	19.0	34.6	10.1
Number of hens	103	113	90
Total no. of productive livestock units	52.9	47.5	40.0
% of total that are:			
Dairy and dual-purpose cows	13.2	30.6	38.2
Other dairy and dual-purpose cattle	11.7	24.3	22.0
In beef breeding herd	42.0	11.2	9.1
Feeder cattle	9.0	3.7	2.3
Sheep	4.8	8.7	3.0
Hogs	16.6	18.5	20.9
Turkeys	.5	.0	1.8
Chickens	2.2	3.0	2.7

Table 32. Summary of Earnings by Years (see footnote, page 29)

	1935	1936	1937	1938	1939	1940	1941
No. of farms	40	81	57	55	91	75	102
FARM EXPENSES							
Horses bought	$41	$42	$33	$33	$25	$17	$15
Cattle bought (including feeders)	79	114	152	133	80	106	174
Hogs bought	31	51	42	32	45	47	92
Sheep bought	105	43	16	43	31	9	9
Poultry bought (including turkeys)	27	30	19	18	25	70	53
Misc. crop expenses	99	108	141	145	147	132	155
Feed bought	184	271	369	253	287	455	554
Power mach. (new & exp.) (farm share)	90*	265	410	336	373	333	548
Custom work hired	-	-	-	-	-	81	103
Machinery and equipment (new)	132*	139	180	124	129	147	249
Machinery and equipment (upkeep)	136*	36	41	36	35	32	47
Buildings, fencing, tiling (new)	152	96	128	55	102	189	177
Buildings, fencing, tiling (upkeep)	28	39	37	40	36	79	100
Hired labor	162	167	217	196	183	215	261
Taxes and insurance	193	204	226	236	258	265	299
General farm	14	19	14	12	9	13	12
Miscellaneous livestock expense	21	30	55	63	48	30	36
(1) Total farm purchases	1494	1654	2080	1755	1813	2220	2884
(2) Decrease in farm capital	-	-	-	-	-	-	-
(3) Board furnished hired labor	88	87	95	78	81	82	103
(4) Interest on farm capital	638	703	752	761	775	870	899
(5) Unpaid family labor	156	241	247	244	336	305	302
(6) Total farm expenses (Sum of (1) to (5)	2376	2685	3174	2838	3005	3477	4188
FARM RECEIPTS							
Horses	$18	$25	$39	$54	$48	$35	$49
Cattle (including feeders)	568	380	656	673	607	547	1057
Dairy products	700	812	919	800	629	763	924
Hogs	474	802	920	890	946	949	1702
Sheep	247	159	161	128	152	85	110
Poultry (including turkeys)	106	142	122	58	137	324	287
Eggs	136	136	135	162	138	164	202
Corn	4	8	20	7	106	28	56
Small grain	149	183	113	51	50	54	66
Other crops	97	102	67	42	50	184	180
Misc.	69	115	189	142	141	189	203
Income from work off farm	101	82	137	177	166	220	155
Agricultural adjustment payments	68	131	149	168	230	226	230
(7) Total farm sales	2737	3077	3627	3352	3400	3768	5221
(8) Increase in farm capital	160	254	66	50	105	493	1257
(9) Family living from farm	311	361	317	315	270	472	535
(10) Total farm receipts (7) + (8) + (9)	3208	3692	4010	3717	3775	4733	7013
(6) Total farm expenses	2376	2685	3174	2838	3005	3477	4188
(11) Operator's labor earnings (10) - (6)	832	1007	836	879	770	1256	2825

*Tractor, truck, gas engine and electricity (new & expense) were included with crop and general machinery and livestock equipment in 1935.

Table 33. Summary of Miscellaneous Items by Years

Miscellaneous items:	1935	1936	1937	1938	1939	1940	1941
Acres in farm	193.9	189.9	203.7	202.3	216.6	219.3	243.0
Crop acres in farm	106.2	100.7	108.7	110.9	107.6	104.5	110.9
% of till. land in high return crops	*	36.7	41.7	40.3	35.6	35.9	36.5
Yield per acre, corn, grain (bu.)	39.1	30.1	34.8	49.5	57.7	57.8	58.6
Yield per acre, corn, silage (tons)	7.3	5.7	6.5	8.9	9.2	10.0	9.4
Yield per acre, barley (bu.)	20.8	18.1	23.9	26.6	22.8	33.3	29.2
Yield per acre, oats (bu.)	33.2	20.8	37.0	31.6	32.2	36.4	31.5
Yield per acre, alfalfa (tons)	3.2	1.8	2.0	2.4	1.5	2.1	2.7
Productive livestock units per 100 A.	14.9	17.6	17.9	20.1	20.0	21.6	22.3
No. of work units	506	550	597	628	646	522	507
Work units per worker	288	301	314	340	321	263	251
Pow., equip., & bldg. exp.per work unit	$ .76	$1.13	$1.10	$1.06	$1.09	$1.36	$1.70
No. of work horses	4.4	4.2	4.3	4.0	3.8	3.6	3.7
No. of colts	.6	.9	.8	1.0	1.0	1.0	.9
No. of dairy and dual-purpose cows	12.7	13.9	13.7	14.2	14.4	13.0	11.7
Head of other dairy & dual-purpose cattle	13.8	17.2	21.2	19.9	21.1	15.9	14.2
No. of litters of pigs	3.7	7.6	6.8	8.7	11.8	11.9	13.7
Pounds of hogs produced	*	8404	9950	12808	16534	17521	19996
No. of head of sheep	26.0	23.7	30.9	30.2	22.4	13.5	15.3
No. of hens	103	79	93	100	101	102	96
Lbs. of butterfat per dairy cow	190	178	192	200	189	225	223
Lbs. of butterfat per dual-purpose cow	*	*	*	*	*	187	191
No. of pigs per litter	6.3	5.6	6.8	6.7	6.1	6.5	6.6
No. of eggs laid per hen	95	102	114	118	115	120	120
Price rec'd. per lb. of B.F. sold	$ .30	$ .31	$ .37	$ .30	$ .27	$ .31	$ .38
Price rec'd. per cwt. hogs sold	*	9.22	9.01	7.55	6.15	5.27	9.23
Price rec'd. per doz. eggs sold	.21	.18	.18	.18	.15	.15	.21
Return above feed cost per:							
Dairy cow	*	37.06	41.33	37.23	29.82	47.25	61.54
Dual-purpose cow	*	*	*	*	*	36.16	52.51
Animal unit in beef breeding herd	*	*	*	*	*	15.36	26.46
Cwt. feeder cattle produced	*	*	*	*	*	2.46	4.64
Cwt. hogs produced	*	2.31	2.21	3.04	1.16	1.18	5.37
Head of sheep (farm flock)	*	2.27	1.98	1.71	2.91	4.17	5.72
Hen	*	.78	1.14	1.21	.73	1.02	1.48
Cwt. turkeys produced	*	*	*	*	*	7.23	10.10
Feed cost per:							
Dairy cow	*	$37.53	42.51	34.22	31.16	35.61	39.97
Dual-purpose cow	*	*	*	*	*	32.07	35.36
Animal unit in beef breeding herd	*	*	*	*	*	31.15	28.22
Cwt. feeder cattle produced	*	*	*	*	*	6.62	7.59
Cwt. hogs produced	*	6.69	6.30	4.37	4.19	4.39	5.20
Head of sheep	*	2.83	2.41	2.25	2.03	2.29	2.72
Hen	*	1.54	1.43	1.22	1.12	1.15	1.61
Cwt. turkeys produced	*	*	*	*	*	7.93	9.61
Horse	*	40.69	33.64	28.44	28.31	30.66	31.87
Price of feed, ear corn (per bu.)	*	$ .81	$ .70	$ .41	$ .40	$ .48	$ .54
Price of feed, bran (per cwt.)	*	1.40	1.35	1.05	1.25	1.30	1.55
Price of feed, alfalfa hay (per ton)	*	9.00	9.50	8.00	7.00	7.50	9.00

*Information not available.

Footnote for pages 27 and 28:

The financial statements differ in that the unpaid family labor rate was $40 per month for 1935, $43 in 1936, $45 in 1937 to 1940, and $50 in 1941; and the board for hired labor was figured at $15 per month in 1935, and $18 per month during the years 1936 to 1940 and $20 in 1941. These adjustments to meet changes in the price level should be considered in comparing 1941 results with previous years.

The data for each of the first three years were for the 12 months' period beginning March first of the three years indicated and ending February twenty-eighth of the following year. The data for 1938 to 1941 were for the period January first to December thirty-first.

Several changes appeared in the 1940 records. The value of the house which had previously been omitted from the farm business is now included and a rental charge equal to 10 per cent of the average value of the house is included with the farm perquisites. The standards used in the calculation of work units were changed in accordance with new information recently made available. This latter change also affected the work units per worker and the factor of expense per work unit. The acres in protected woodlots, roads, waste and farmstead were omitted from the acreage used in the calculation of amount of livestock per 100 acres. Several new livestock statements were added. Cattle kept for milk production were classified into two groups, "specialized dairy cattle" and "dual-purpose cattle." Separate statements are presented for these groups. Statements for beef breeding cattle, feeder cattle and turkeys were also included.

Suggestions for Improvements