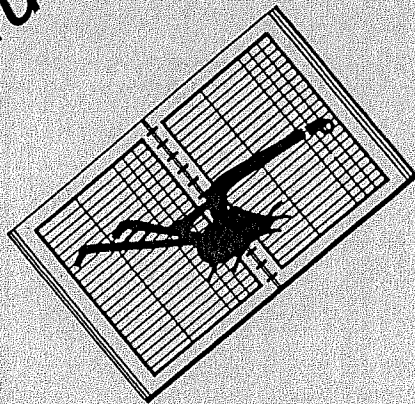


FARM BUSINESS MANAGEMENT

1990 Annual Report



April 1991

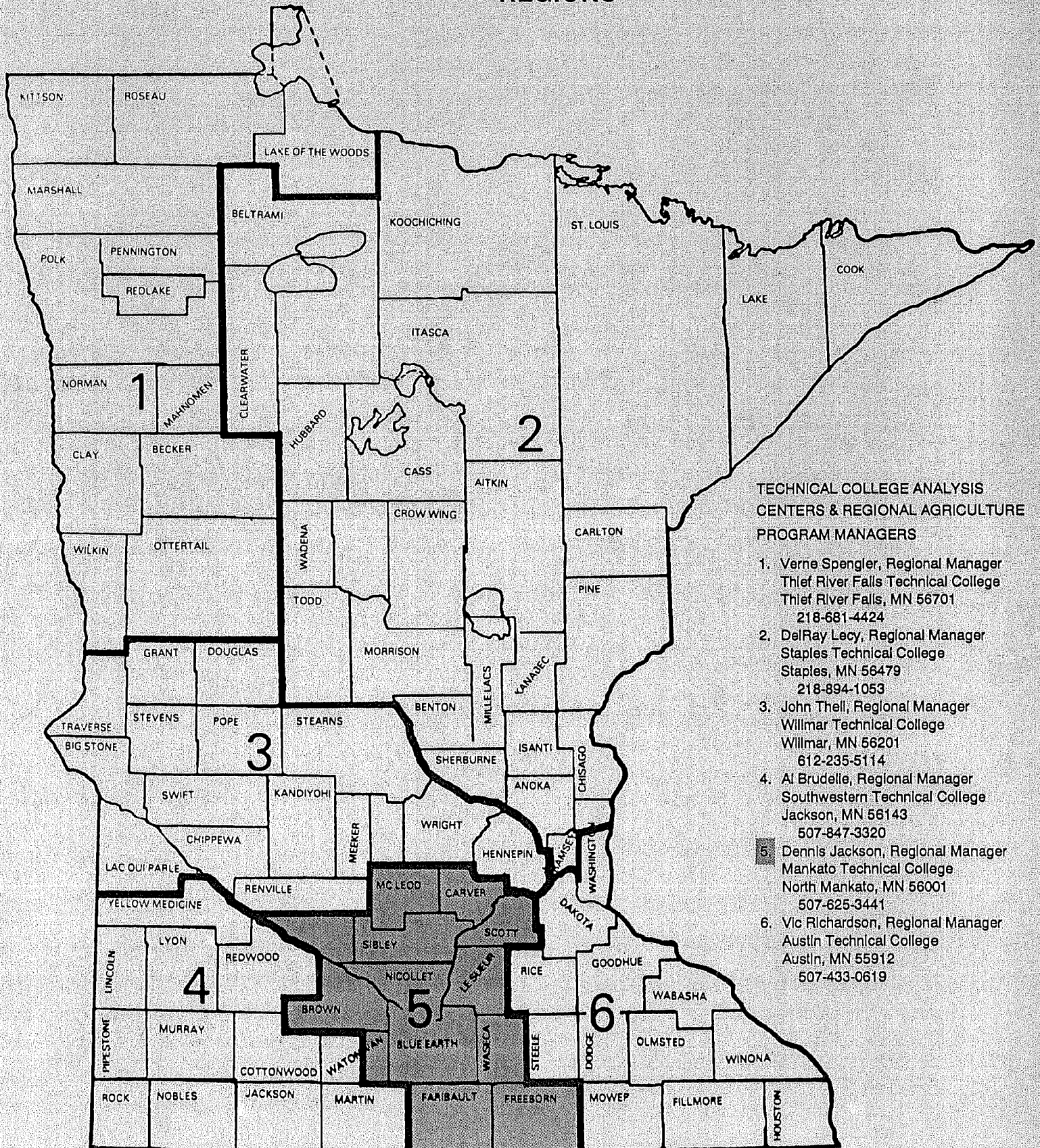
Mankato Technical College

In cooperation with the
Minnesota Technical College System
and the Division of Agricultural
Education, University of Minnesota.

AN ADULT EDUCATIONAL PROGRAM

Single Copy \$5.00

FARM BUSINESS MANAGEMENT REGIONS



TECHNICAL COLLEGE ANALYSIS CENTERS & REGIONAL AGRICULTURE PROGRAM MANAGERS

1. Verne Spengler, Regional Manager
Thief River Falls Technical College
Thief River Falls, MN 56701
218-681-4424
2. DelRay Lecy, Regional Manager
Staples Technical College
Staples, MN 56479
218-894-1053
3. John Thell, Regional Manager
Willmar Technical College
Willmar, MN 56201
612-235-5114
4. Al Brudelle, Regional Manager
Southwestern Technical College
Jackson, MN 56143
507-847-3320
5. Dennis Jackson, Regional Manager
Mankato Technical College
North Mankato, MN 56001
507-625-3441
6. Vic Richardson, Regional Manager
Austin Technical College
Austin, MN 55912
507-433-0619

ANNUAL FARM BUSINESS MANAGEMENT PROGRAM REPORT
MANKATO AREA OF SOUTHERN MINNESOTA

Dennis Jackson
Regional Agriculture Program Manager

TABLE OF CONTENTS

Schools Participating	ii
Introduction	iii
Record Reliability Check	1
Explanation of 200 Series Tables	2
Cash Operating Income & Expense - Table 200	3-4
Accrual Statement of Profit & Loss - Table 210	5
Measures of Profitability, Liquidity, Solvency - Table 220 ..	6
Farm Size and Production Summary - Table 230	7
Explanation of Financial Position Tables	8
Operator's Financial Position - Tables 5.1 & 5.2	9-12
Explanation of Measures of Farm Organization	13
Measures of Farm Organization & Mgmt Efficiency - Table 8 ..	14
Explanation of Non-Farm & Whole Farm Tables	15
Non-Farm, Household & Personal Income & Expense - Table 4 ..	16
Resources Used in the Business - Table 1	17-18
Enterprise Statement - Table 3	19
Explanation of Earnings Statements	20
Summary of Cash Receipts & Expenses - Tables 2A&B, 6A&B ...	21-24
Summary of Management Information - Table 500	25
Crop Acres & Yields - Table 9	26
Explanation of Crop Enterprise Analyses	27
Table 10 - Crop Data for Oats	28
Table 10 - Crop Data for Spring Wheat	29
Table 10 - Crop Data for Winter Wheat	30
Table 10 - Crop Data for Canning Corn	31
Table 10 - Crop Data for Canning Peas	32
Table 10 - Crop Data for Corn, Grain	33
Table 10 - Crop Data for Soybeans	34
Table 10 - Crop Data for Set Aside & CRP Land	35
Table 10 - Crop Data for Alfalfa Hay	36
Table 10 - Crop Data for Grass Hay & Wild Hay	37
Table 10 - Crop Data for Oat Silage & Legume Silage	38
Table 10 - Crop Data for Corn Silage	39
Explanation of Livestock Enterprise Analyses	40
Table 11A - Costs & Returns from Farrow to Finish Hogs	41-42
Table 11B - Costs & Returns from Finishing Hogs	43-44
Table 11C - Costs & Returns from Producing Feeder Pigs	45-46
Table 11D - Costs & Returns from Mixed Hog Enterprise	47-48
Table 11E - Costs & Returns from Combined Hog Enterprise ..	49-50
Table 12 - Costs & Returns from Dairy Cows	51-52
Table 13 - Costs & Returns from Other Dairy Cattle	53-54
Table 14 - Costs & Returns from All Dairy Cattle	55-56
Table 15B - Costs & Returns from Beef Feedlot	57-58
Table 15B - Costs & Returns from Dairy Beef Feedlot	59-60
Table 15A - Costs & Returns from Beef Breeding Herd	61
Table 16 - Costs & Returns from Sheep Flock	62
Trend Analysis - Table 600	63-66
Average Prices for Farm Grown Feeds & Other Non-Cash Costs	67
Explanation of Work Units & Animal Units	68
Range of Returns to Labor & Management - Graph	69

INTRODUCTION

Farm Business Management education programs have been a part of the Agriculture Education program in Minnesota schools since 1952. From the early cooperative efforts of the State Department of Education and the Department of Agriculture Education (University of Minnesota), the program has expanded to serve over 6000 farm families each year in six farm management areas. Programs are now administered and managed by the Minnesota Technical College System through the Technical Colleges and local school districts.

The purpose of farm management education is to help farm families achieve their farm business and family goals. This is done through improved management organization and efficiency of their farm operations. This purpose has not changed over the years.

To accomplish these purposes, programs have been organized to conform to the following guidelines:

1. Farm families enroll in a specific management course.
2. Each course has a specific objective and units of instruction to meet the objective.
3. Courses are offered in sequence and farmers are expected to enroll in the first of the sequence of courses.
4. There is continuity to each course. Each leads to the next course in the sequence.
5. Instruction occurs both in the classroom and on the farm with the farm family.

Programs organize their course around the same central theme.

They are:

- Year 1 - Farm business records and accounts.
- Year 2 - Farm business analysis and evaluation.
- Year 3 - Farm business organization.
- Year 4 - Farm reorganization and enterprise efficiency.
- Year 5 - Current issues in farm management.
- Year 6 - Managing the business for family goal attainment.

Like most educational programs, members benefit from the instruction in relation to how much effort they put into study. Some farmers have benefited more, and some less, depending upon how seriously they studied the results of their business analysis and the kind of decisions they made as a result of their analysis.

The farm business and enterprise analysis format allocates all specific and general farm expenses to each farm enterprise. A new set of tables, the Table 200 series, has been introduced this year to provide a more standard Profit & Loss format which separates cash and accrual transactions, and easier to understand measures of Profitability, Liquidity and Solvency. The allocation of all costs and the introduction of the new tables makes the analysis a more useful report to be used for long range planning, short term cash purchase planning and cash flow projections.

DESCRIPTION OF ANALYSIS TABLES 200 SERIES

The four tables in the Table 200 series are new for 1990 records.

TABLE 200 is a newly organized Cash Statement of Operator's Farm Profit and Loss. It provides a detailed picture of cash incomes and expenditures, as well as grouping them into categories. It shows the Net Cash Income for the farm operation.

TABLE 210 provides the Accrual Statement of operator's Farm Profit or Loss. The Net Cash Income from Table 200 is adjusted for the change in inventory value of current assets such as grain and market livestock to determine the Net Operating Income.

Depreciation and Capital Adjustments of intermediate and long term assets such as machinery, buildings and land, and other adjustments for changes in Accounts Payable and Delinquencies are then added or subtracted to determine the Net Farm Profit or Loss.

TABLE 220 reports various Measures of Farm Profitability, Liquidity, and Solvency.

Profitability is reported as:

- 1) Return to Capital, Family Labor & Management
- 2) Net Return to Operator's Labor & Management
- 3) Net Return to Labor & Management (fulltime equivalent)
- 4) Return to Farm Capital
- 5) Return to Operator Equity

Liquidity is shown as the amount available to service non Real Estate Debt and the years required to turnover non Real Estate Debt, both determined after paying family living expenses and servicing real estate debt.

Solvency is shown as Operator Equity as well as the percent in debt by category.

TABLE 230 shows various measures of farm size, ie; acres, units of work accomplished, number of workers on the farm, and operator investment.

Table 230 also provides a brief summary of crop and livestock production & cost for the past year.

NOTE: The Accuracy/Reliability check on the previous (facing) page shows the accuracy of the farm record in reporting cash, liabilities and net worth.

-4-

YEAR END 1990

CASH STATEMENT OF OPERATOR'S FARM PROFIT OR LOSS - TABLE 200

CASH FARM OPERATING EXPENSES	AVERAGE OF 450 FARMS	90 HIGH RETURN	90 LOW RETURN
Purchase of Mkt Lvstk & Lvstk Expenses			
Beef Feedlot	5094	13473	3973
Beef Feedlot-Dairy Beef	397	22	
Beef-Veal	43		
Chickens	1		3
Other Dairy Cattle	136	35	37
Feeder Pigs	4285	5472	2070
Feeder Sheep	8	11	
Turkeys-Custom Feeding	433	2166	
Hogs-Contract Feeding	696	3023	
Vet & Misc Lvstk Expense	5456	8321	2474
Feed Bought	21626	40350	10784
Total Lvstk Expenses	38175 *	72873 *	19341 *
Crop Expenses			
Fertilizer	9753	14775	8390
Chemicals	7737	12034	6490
Seed	6209	9403	5425
Drying	1635	2537	1369
Irrigation Operation	6		14
Other Crop Expenses	3661	4898	4226
Purchase for Resale	9035	11977	6369
Total Crop Expenses	38036 *	55624 *	32283 *
Operating Expenses			
Fuel & Lubricants	5580	7664	4692
Repair: Lvstk Equip	1981	3105	1023
Repair: Farm Real Estate	1805	2478	1359
Repair: Machy & Vehicles	8211	9799	8043
Repair: Irrigation Equip	6		6
Total Fuel/Repair Exp.	17583 *	23046 *	15123 *
Misc. Farm Expenses			
Custom Work Hired	3521	5603	2429
Custom Ent. Oper. Costs	1000	1584	1965
Hired Labor	4187	7129	2697
Pers Prop & RE Taxes	1879	2680	1808
General Farm Expenses	3530	4851	3383
Utilities	3103	4468	2346
Capital Lease Payment	20057	32863	13280
Interest Actually Paid	16567	23489	12730
Total Misc. Expenses	53844 *	82667 *	40638 *
(B) Cash Operating Expense	147638 *	234210 *	107385 *
(C) Net Cash Income (A-B)	45952 *	90055 *	26897 *

-6-

YEAR END 1990

MEASURES OF FARM PROFITABILITY, LIQUIDITY, SOLVENCY - TABLE 220

	AVERAGE OF 450 FARMS		90 HIGH RETURN		90 LOW RETURN	
****PROFITABILITY****						
(K) Net Farm Profit or Loss	48333		103348		12854	
(L) Family Liv. from the Farm	440		643		297	
(M) Wages Paid to Spouse	740		1151		763	
(N) Board Furnished Hired Labor	49		119			
(O) Net Return:Cap,Fam Lbr,Mgt (K+L+M-N)	49464 *		105023 *		13914 *	
Capital Cost Calculation:						
(I) Avg Total Farm Capital	395090		581966		360299	
(P) Opport Cost on Capital (I*7%)	27656		40738		25221	
(Q) Interest Actually Paid	16567		23489		12730	
(R) Interest on Operator Equity (P-Q)	11089		17249		12491	
(S) Value of Unpaid Family Labor	548		600		678	
Net Return: Oper Labor & Mgmt (O-R-S-M)	37087 *		86023 *		-18 *	
Number of Oper., Fulltime Equiv	1.11		1.44		0.99	
Net Return to Lbr & Mgmt/Fulltime Equiv	33412		59738		-18	
(T) Value of Operator Labor & Mgmt	17443		22546		14421	
(U) Return to Farm Capital (O+Q-T)	48588		105966		12223	
Rate of Return of Avg Capital (U/I)	12.3 *		18.2 *		3.4 *	
(V) Operator Avg Equity	281795		428129		284819	
(W) Return to Operator Equity (O-T)	32021		82477		-507	
Rate of Return to Equity (W/V)	11.4		19.3		-0.2	
(X) Value of Farm Production (A+E)	206131		352057		133835	
Net Profit Margin (U/X)	23.6		30.1		9.1	
Asset Turnover Rate (X/I)	52.2		60.5		37.1	
****LIQUIDITY****						
	CASH	ACCRUAL	CASH	ACCRUAL	CASH	ACCRUAL
(C) Net Cash Farm Income	45952	45952	90055	90055	26897	26897
(E) Net Change in Inventory	XXX	12541	XXX	27792	XXX	-447
(F) Net Operating Income (C+E)	45952	58493	90055	117847	26897	26450
(Y) Non Farm & Spouse Income	12286	12286	8661	8661	16539	16539
(Z) Total Spendable Income (F+Y)	58238	70779	98716	126508	43436	42989
(AA) Family Living & Taxes Paid (T4 L38)	37501	37501	49626	49626	30587	30587
(AB) Scheduled RE Est Principal Pymts	4973	4973	7727	7727	2950	2950
(AC) Avail for Non RE Debt (Z-AA-AB)	15764	28305	41363	69155	9899	9452
(AD) Average Non Real Estate Debt	77544	77544	106169	106169	67456	67456
Years to Turnover Non RE Debt (AD/AC)	4.9	2.7	2.6	1.5	6.8	7.1
****SOLVENCY****						
	BEGIN	END	BEGIN	END	BEGIN	END
Total Assets	449789	486473	644428	716876	428700	448410
Total Liabilities	182513	190159	250240	254807	147295	160177
Operator Equity	267276	296314	394188	462069	281405	288233
Change in Equity	XXX	29038	XXX	67881	XXX	6827
Percent in Debt:						
Farm, Current	34.0	33.9	37.1	32.3	34.5	43.3
Farm, Intermediate	44.5	43.4	38.9	37.6	43.3	40.6
Farm, Working (Curr + Intermed)	39.1	38.5	37.9	34.5	39.4	41.7
Farm, Fixed	54.4	51.7	54.1	50.2	40.6	40.6
Non Farm	5.9	6.1	2.8	2.5	3.9	5.3
Total (Farm & Non Farm)	40.6	39.1	38.8	35.5	34.4	35.7
Current Portion of Total Debt	32010	37129	51464	53558	24620	32618
Total Money Borrowed this Year	XXX	76731	XXX	133975	XXX	60177
Total Principal Paid this Year	XXX	69991	XXX	129391	XXX	48393

EXPLANATION OF OPERATOR'S FINANCIAL POSITION

Tables 5.1 & 5.2 provide a categorical listing of operator's assets and liabilities and determine Operator Equity. The change in equity is a measure of progress which, over a period of years, is one of the best measures of financial progress.

EXPLANATION OF TABLE 5.2 RATIOS

- 32 THE CURRENT RATIO Is a measure of liquidity that indicates the shortrun ability of the business to service debt. It demonstrates the adequacy of current assets, if liquidated, to pay off annual debts as they come due. Usually current assets have a life of 1 year or less. It is calculated by dividing current assets by current liabilities.
- 33 INTERMEDIATE RATIO Intermediate assets and liabilities are those where the finances used are converted into product in a period usually from one to ten years. Examples may be breeding livestock, machinery and equipment. The increase in the ratio over a period of time is a favorable sign. It is calculated by dividing intermediate assets by intermediate liabilities.
- 34 WORKING RATIO The desired trend is for this ratio to increase over time. It is also desirable for this ratio to be larger than the fixed ratio and net capital ratio. The farm business needs to have sufficient liquid assets and retain management flexibility to absorb price decreases and other factors negatively affecting current and intermediate asset values. This ratio is calculated by dividing current assets and intermediate assets by current liabilities and intermediate liabilities.
- 35 THE FIXED RATIO Should be in excess of one, but it is also important for this ratio to be increasing over time. This ratio should not be increased at the expense of a safe working ratio. It is calculated by dividing long term assets by long term liabilities.
- 36 THE NET CAPITAL RATIO Is one of three measures of solvency; how much value remains if all assets are converted to cash at inventoried value and the total debt is paid. This ratio reflects the risk-bearing capacity of the farm business by showing the percentage that assets could decline and still cover liabilities. The higher the ratio number, the better the risk. A ratio of less than 1.0 = insolvent, a ratio of 1.0 = a net worth of zero. This ratio is calculated by dividing total assets by total liabilities.
- 37 EQUITY/ASSET This ratio shows the portion of total assets paid for and owned by the operator clear of financial claims. A ratio of .80 shows that the operator owns 80% of all total assets and a ratio of .44 shows he owns only 44% of all total assets. Therefore, this should be increasing over time. It is calculated by dividing total equity by total assets.
- 38 DEBT/EQUITY Is another overall measure of solvency. It shows the relationship between debt and equity. A ratio of 1.00 indicates that equity and debt are equal. That would be equivalent to a net capital ratio of 2.00 to 1.00 and an asset equity/asset ratio of .50 to 1.00. All measures of solvency use the same three measures of financial position. They all express relationships between assets, liabilities and net worth (or equity). Lenders prefer a debt-equity ratio of less than 1.0. It is calculated by dividing total liabilities by total equity.
- 39 CURRENT DEBT The lower the current debt structure ratio is, the more liquid the business. A ratio of .10 means only one dollar (\$1.00) out of every \$10 debt must be paid within the next year. A ratio of .50 means one half of the total debt must be paid in the next year. This ratio is calculated by dividing current liabilities by total liabilities.

-10-

OPERATOR'S FINANCIAL POSITION - TABLE 5.2

AVERAGE OF 395 FARMS

	JAN 1	DEC 31
CURRENT LIABILITIES:		
4 Accounts Payable: Personal	27	31
5 Account Payable: Farm	400	543
5A Current Portion: Real Estate	5047	5913
6 Current Portion: Intermediate Debt	7693	8256
6A Current Portion: Notes & Line of Credit	18712	22164
7 Delinquent Interest	70	82
8 Rents & Lease Payments Due From Past Year	61	139
9 Total Current Liabilities	32010	37129 *
# INTERMEDIATE LIABILITIES:		
11 Notes Payable: Personal	146	246
12 Notes Payable: Farm	10068	9791
13 Chattel Mortgages: Personal	759	812
14 Chattel Mortgages: Farm	32458	36131
16 Total Intermediate Liabilities	43430	46980
# LONG TERM LIABILITIES:		
18 Real Estate Mortgages & Contracts: Personal	2516	2843
19 Real Estate Mortgages & Contracts: Farm	104557	103208
21 Total Long Term Liabilities	107073	106051 *
22 Total Liabilities	182513	190159 *
23 Equity	267276	296314
24 Change in Equity		29038 *
***** RATIOS *****		
Formula	Beg. Yr.	End Yr. %
32 Current Debt	3.28	3.20 31.27
T5.1 L17 / T5.2 L9		
33 Intermediate Debt	2.82	2.88 34.70
T5.1 L37 / T5.2 L16		
34 Working Debt	3.01	3.02 33.10
(T5.1L17+L37)/(T5.2L9+L16)		
35 Fixed Debt	2.08	2.19 45.64
T5.1 L43 / T5.2 L21		
36 Net Capital Debt	2.46	2.56 39.09
T5.1 L44 / T5.2 L22		
37 Equity/Asset Eqty	0.59	0.61 60.91
T5.2 L23 / T5.1 L44		
38 Debt/Equity Debt	0.68	0.64 64.17
T5.2 L22 / T5.2 L23		
39 Current Debt	0.18	0.20 19.53
T5.2 L9 / T5.2 L22		
51 Return to Capital, Fam Labor, & Mgmt	52538 *	
52 Total Income From Non-Farm Sources	12219	
53 Total Family Income	64757	
54 Total Family Cash & Non-Cash Expense	37878	
55 Total Money Borrowed	73332 *	
56 Total Paid on Debt	65927	

-12-

TABLE 5.2 - OPERATOR'S FINANCIAL POSITION - 1990

		79 MOST PROFITABLE FARMS		79 LEAST PROFITABLE FARMS	
		JAN 1	DEC 31	JAN 1	DEC 31
CURRENT LIABILITIES:					
4	Accounts Payable: Personal	30	17	6	
5	Account Payable: Farm	263	380	242	480
5A	Current Portion: Real Estate	8121	10002	2909	4592
6	Current Portion: Intermediate Debt	11912	9104	6151	6873
6A	Current Portion: Notes & Line of Credit	31075	33575	15197	20596
7	Delinquent Interest				13
8	Rents & Lease Payments Due From Past Year	63	480	114	64
9	Total Current Liabilities	51464	53558	24620	32618
# INTERMEDIATE LIABILITIES:					
11	Notes Payable: Personal	199	241	63	177
12	Notes Payable: Farm	7835	6963	13806	13355
13	Chattel Mortgages: Personal	247	339	691	774
14	Chattel Mortgages: Farm	40312	46074	27118	27781
16	Total Intermediate Liabilities	48594	53617	41678	42086
# LONG TERM LIABILITIES:					
18	Real Estate Mortgages & Contracts: Personal	1565	1410	1473	2406
19	Real Estate Mortgages & Contracts: Farm	148617	146222	79525	83067
21	Total Long Term Liabilities	150182	147632	80998	85473
22	Total Liabilities	250240	254807	147295	160177
23	Equity	394188	462069	281405	288233
24	Change in Equity		67881		6827
*****RATIOS*****					
Formula		Beg. Yr.	End Yr.	%	Beg.Yr. End Yr. %
32	Current Debt T5.1 L17 / T5.2 L9	3.46	3.92	25.49	3.21 2.39 41.76
33	Intermediate Debt T5.1 L37 / T5.2 L16	3.12	3.22	31.09	3.02 3.21 31.16
34	Working Debt (T5.1L17+L37)/(T5.2L9+L16)	3.29	3.57	28.01	3.09 2.85 35.04
35	Fixed Debt T5.1 L43 / T5.2 L21	2.10	2.26	44.16	2.76 2.75 36.33
36	Net Capital Debt T5.1 L44 / T5.2 L22	2.58	2.81	35.54	2.91 2.80 35.72
37	Equity/Asset Eqty T5.2 L23 / T5.1 L44	0.61	0.64	64.46	0.66 0.64 64.28
38	Debt/Equity Debt T5.2 L22 / T5.2 L23	0.63	0.55	55.14	0.52 0.56 55.57
39	Current Debt T5.2 L9 / T5.2 L22	0.21	0.21	21.02	0.17 0.20 20.36
51	Return to Capital, Family Labor, & Mgmt	109203			16375
52	Total Income From Non-Farm Sources	6719			15995
53	Total Family Income	115922			32370
54	Total Family Cash & Non-Cash Expense	49967			30886
55	Total Money Borrowed	118131			58165
56	Total Paid on Debt	114077			45522

Does not include current portion of principal due within the next 12 months.

MEASURES OF FARM ORGANIZATION & MANAGEMENT EFFICIENCY - TABLE 8

ITEMS	AVERAGE OF 450 FARMS	90 HIGH RETURN	90 LOW RETURN
Return to Operator's Labor & Mgmt	39738	89952	2011
Crop Yield Index	100.0	102.5	96.0
Return Over All Listed Cost per Tillable Acre (Excl. Pasture)	49.09	55.23	24.62
Gross Return/Till Acre (Excl Pasture)	299.24	278.83	264.00
Index Return / \$100 Feed Fed	100.0	110.5	99.1
Livestock Units / 100 Acres #	22.99	28.05	11.24
Size of Business in Total Work Units	475.9	768.1	326.1
Work Units / Worker	330.49	385.98	267.30
Power, Machinery, Equipment, Building Expense / Work Unit	83.69	76.24	101.70
Number of Animal Units	98.37	176.66	41.38
Work Units:			
Crops	207.7	309.4	182.9
Productive Livestock	255.1	440.4	121.6
Other Productive Work Units	13.1	18.3	21.6
Expenses / Work Unit			
Tractor & Crop Machinery	42.49	35.60	56.90
Auto & truck: Farm Share	11.36	9.16	13.51
Electricity: Farm Share	5.70	5.24	5.80
Livestock Equipment	8.64	9.90	5.64
Building, Fence & Tiling	14.47	15.37	18.46
Other Expense Per Total Work Units			
Gen Farm, Phone, Other Util	8.63	7.56	11.77
Wages for Hired Labor	8.91	9.43	8.27
Tractor, Crop Machinery Expense per Crop Acre ##	47.23	43.33	50.42
Farm Power & Machinery Cost			
Allocated to Livestock	3149.51	4282.93	2316.95
Allocated to Crops	20197.49	27703.07	19418.05
Building, Fence, Tile Cost			
Allocated to Livestock	3082.08	6409.71	1961.55
Allocated to Crops	3856.42	5971.41	4471.87

Acres include all tillable land, non-tillable hay & pasture.

Acres include all tillable land plus acres in non-tillable hay.

Supplementary Operator's Management Information

Return to Capital & Family Labor	52538	109619	16972
Operator's Depreciation:			
Farm Power & Crop Machinery	8515	11826	7781
Irrigation Equipment	23	100	
Custom Work Equipment	140	32	454
Livestock Equipment	1363	2544	378
Buildings, Fences	3824	6306	4372
Land Improvements & Tile	735	1310	593
Total Operator's Depreciation	14600	22118	13578

-16-

TABLE 4 - NON FARM INCOME & HHP EXPENSE - 1990

	AVERAGE OF 219 FARMS	PER ADULT AVERAGE	EQUIVALENT 43 HIGH PROFIT	43 LOW PROFIT
4 Number of Persons - Family	4			
5 Number of Adult Equiv - Family	3.2			
6 Non Farm Income				
7 Outside Investment Income	1972			
8 Other Pers Income & Tax Refund	9219			
9 Sale of Dwell/Auto/Trk (Pers)	140			
10 Net Cash from Non Farm Business	888			
11 TOTAL NON FARM INCOME	12219	3818.44	1919.71	5515.52
<hr/>				
HOUSEHOLD EXPENSE	TOTAL	PER ADULT AVERAGE	EQUIVALENT HIGH	LOW
14 Church & Charity	995	310.94	348.29	291.38
15 Medical Care & Health Insurance	3504	1095.00	1160.86	1013.79
16 Food & Meals Bought	4870	1521.88	1597.14	1377.24
17 Operating Expense & Supplies	1987	620.94	680.86	636.55
18 Furnishings & Equipment	1386	433.13	501.14	336.21
19 Clothing & Materials	1681	525.31	553.71	451.38
20 Personal Care, Spending	2232	697.50	1024.00	774.14
21 Education	775	242.19	372.86	246.90
22 Recreation	1342	419.38	412.29	536.90
23 Gifts & Special Events	1369	427.81	565.43	300.00
24 Personal Interest	396	123.75	171.43	105.17
25 TOTAL CASH HOUSEHOLD EXPENSE	20537	6417.81	7388.57	6069.66
26 Truck & Auto Expense: Personal	1528	477.50	445.14	620.69
27 Upkeep on Dwelling: Personal	534	166.88	279.71	119.31
28 Cash Rent: Personal	52	16.25		19.31
29 Telephone & Elec Expense: Personal	1020	318.75	293.14	303.10
30 General Farm Expense: Personal	134	41.88	23.71	45.17
31 TOTAL CASH LIVING & OPER EXPENSE	23805	7439.06	8430.00	7177.24
32 New Truck & Auto: Personal	1455	454.69	508.29	429.66
33 New Dwelling, Bldgs, Land: Personal	1896	592.50	362.57	208.97
34 Taxes & Other Deductions	5132	1603.75	2058.86	1513.79
35 Life Insurance	1620	506.25	683.43	428.62
36 Paid on Personal Debt (Principal)	771	240.94	419.71	189.66
37 Savings & Invest (Excl Life Ins)	2822	881.88	1715.71	599.31
38 TOTAL NON FARM CASH EXPENSES	37501	11719.06	14178.86	10547.24
39 TOTAL NON FARM EXP (L38-L11)	25282	7900.63	12259.14	5031.72
40 TOTAL FAMILY LIVING FROM FARM	377	117.81	97.71	103.10
41 TOTAL CASH/NON CASH EXPENSE	37878	11836.88	14276.29	10650.34
*****SUPPLEMENTARY INFORMATION*****				
43 Family Living From The Farm	QTY	VALUE	VALUE	VALUE
44 Milk & Cream (Qts.)	147	41	38	30
45 Beef & Buffalo (LBS)	459	272	219	236
46 Pork (LBS)	139	59	84	32
47 Lamb, Mutton, Goat (LBS)	5	3		
48 Poultry, All Fowl (LBS)	3	2		
49 Eggs (Doz)				
50 Veg, Other Produce & Wood				
51 TOTAL FAMILY LIVING FROM FARM		377	342	299
52 CALCULATED LIVING EXPENSE				
53 Total Family Income		64757	115922	32370
54 Minus Change in Net Worth		29038	67881	6827
55 Apparent Family Living		35719	48041	25543
56 Total Family Living/WU Calc.		78.80	64.61	93.80
57 Net Family Living/WU		53.12	55.86	44.75

-18-

TABLE 1 - RESOURCES USED IN THE BUSINESS - 1990

MEASURES OF FARM SIZE		90 MOST PROFITABLE FARMS	90 LEAST PROFITABLE FARMS		
2	ACRES - Total	657.1	377.4		
3	- Tillable	625.7	355.1		
4	WORK UNITS - Crops	309.4	182.9		
5	- Livestock	440.4	121.6		
6	- Other	18.3	21.6		
7	- Total	768.1	326.1		
8	WORKERS - Operator(s) Yr Equiv	1.44	0.99		
9	- Hired	0.41	0.15		
10	- Custom	0.08	0.03		
11	- Unpaid Family	0.06	0.05		
12	- Total	1.99	1.22		
13	CAPITAL INVESTED - Per Worker	454090	479818		
14	- Per Work Unit	1176	1795		
WHOLE FARM INVENTORIES		JAN 1	DEC 31	JAN 1	DEC 31
22	Feeder Cattle	15658	17165	4914	4774
23	Market Hogs	31313	36383	4824	5735
24	Feeder Lambs	58	84	2	31
25	Poultry - All Types	3714	3187		
26	Other Livestock - Incl Other Dairy	1424	1200	877	1052
27	Crops Held for Sale & Livestock Feed	105455	124897	52966	49910
28	Supplies/Prepays, Fuel & Lubricants	14486	17186	5433	5725
29	Accts Rcvbl & Hedge Acct Equity	3437	4085	2982	2538
30	Dairy Cows	14214	14477	4883	5297
31	Other Dairy	6793	7291	1775	1709
32	Beef Breeding	1479	1311	357	309
33	Swine Breeding	11613	12889	1982	2218
34	Sheep Breeding	77	77	88	92
35	Other Breeding Livestock			44	
36	Auto & Truck (Farm Share)	6585	8329	5542	6165
37	Power & Machinery	53303	64424	59517	62941
38	Livestock Equipment	11548	13719	5777	6642
39	Custom Equipment	2323	2234	4816	5400
40	Irrigation Equipment	538	447	352	313
50	Bare Land	521830	533651	376909	376786
51	Land Improvements & Tile	10732	12544	6035	6741
52	Buildings-Fences-Etc.	56119	58998	43144	43159
60	TOTAL FARM CAPITAL	872699	934578	583219	587537
70	Increase or Decrease in Total Farm Capital		61879		4318

DESCRIPTIONS OF EARNINGS STATEMENTS

Receipts (Tables 2A & 6A) are combined because they are derived the same way, except that Table 2A represents the whole farm and Table 6A represents the operator's share only. This table provides a listing of all the sources of farm income - operating income, income from the sale of capital assets, and gain in capital inventory values (if any). Table 6A also calculates net cash operating income which includes operating income and expense and the purchase and sale of breeding stock.

Expenses (Tables 2B & 6B) are combined because they are derived the same way. Table 2B represents the whole farm and Table 6B represents the operator's share only. This table provides a listing of farm expenses - operating expense, the purchase of capital assets, and decrease in capital inventory values (if any). An opportunity charge for interest on farm capital investment at 7% (adjusted for interest actually paid on Table 6B) is included to determine the return to labor and management. The return to capital and family labor shown on Table 6B represents the amount available to the family for living expenses, debt service and savings.

-22-

450 FARMS AVERAGE

CASH EXPENSES - TABLE 2B & 6B

	2B	6B	6B
	WHOLE	OPER	% OF
	FARM	SHARE	L 43
Purchase of Livestock			
5 Dairy Cows	505	502	
6 Other Dairy Cattle	335	310	
7 Beef Breeding Cattle	38	38	
8 Beef Feeder Cattle	5689	5537	
9 Hogs Complete & Mixed	930	905	
10 Hogs Finishing	4348	4091	
11 Hogs Producing Feeder Pigs	618	566	
12 Sheep, Goats, Wool: Breeding	18	18	
13 Sheep, Wool: Feeders			
14 Poultry, All Fowl	154	154	
15 Custom, Contract Livestock Feeding	1129	1129	
16 Other Productive Livestock			
17 Total Livestock Purchases	13765	13250	8.84
20 Vet, Breeding & Misc Livestock Exp	5689	5456	3.64
21 Purchase of Crops & Supp for Resale	9035	9035	6.03
22 Feed Bought	22609	21626	14.43
23 Fertilizer	10115	9753	6.51
24 Chemicals	8087	7737	5.16
25 Other Crop Expense	11882	11505	7.68
26 Irrigation Operation Cost	6	6	
27 CW Oper Costs Excl Labor & Repair	506	506	0.34
28 Custom Work Hired	3660	3521	2.35
29 Gas, Diesel & Lubricants	5761	5580	3.72
30 Repair & Upkeep of Lvstk Equip	2064	1981	
31 Repair & Upkeep of Farm Real Estate	1849	1805	
32 Repair & Oper Mach, Trac, Trk, Auto	8462	8211	
33 Repair & Upkeep of Irrig Equip	6	6	
34 Repair & Upkeep of Custom Work Equip	495	495	
35 Total All Repairs	12875	12498	8.34 *
36 Wages of Hired Labor	4241	4187	2.79
37 Personal Property & Real Est. Taxes	4057	1879	1.25
38 General Farm Expenses	3617	3530	2.36
39 Utilities	3205	3103	2.07
40 Farm Capital Lease Expense	2342	20057	13.39
41 Total Interest Payable This Year	XXX	16596	11.08
42 Operator Interest Actually Paid	XXX (16567)	
43 Total Cash Operating Expense	121452	149826	100.00 *
50 Auto, Truck & Machinery Bought	16998	16520	
51 Irrigation Equipment Bought			
52 Custom Work Equipment Bought	485	485	
53 Livestock Equipment Bought	2829	2787	
54 New Real Estate:Buildings & Fences	5732	5674	
55 New Real Estate:Land-Land Improvemen	6970	6739	
57 Total Capital Purchases	33014	32206 *	
58 Total Farm Purchases	154466	182033 *	
60 Decrease in Farm Capital (Not Incl Cash)			
61 Interest on Farm Capital: 7% Charge	43959	11512	
62 Unpaid Family Labor	548	548	
63 Board Furnished Hired Labor	49	49	
64 Total Farm Expense	199022	194142 *	
70 Ret to Oper Labor & Mgmt(6A/62)-(64)	41400	39738 *	
71 Number of Operators	1	XXX	
72 Full Time Operator Equivalent	1.11	XXX	
73 Ret/Oper/Full Time Op Equiv (70/72)	37297	XXX	
74 *Ret: Cap & Family Labor & Mgmt	XXX	52538 *	

-24-

TABLE 2B & 6B - CASH EXPENSES

	90 FARMS HIGH		90 FARMS LOWS	
	2B	6B	2B	6B
	WHOLE	OPER	WHOLE	OPER
	FARM	SHARE	FARM	SHARE
Purchase of Livestock				
5 Dairy Cows	650	650	1147	1147
6 Other Dairy Cattle	378	378	212	212
7 Beef Breeding Cattle	59	59	7	7
8 Beef Feeder Cattle	14112	13496	4114	3973
9 Hogs Complete & Mixed	1962	1836	697	697
10 Hogs Finishing	5757	5193	2016	2016
11 Hogs Producing Feeder Pigs	1215	957	294	294
12 Sheep, Goats, Wool: Breeding	11	11	16	16
13 Sheep, Wool: Feeders				
14 Poultry, All Fowl	763	763	3	3
15 Custom, Contract Livestock Feeding	5190	5190		
16 Other Productive Livestock				
17 Total Livestock Purchases	30098	28533	8506	8365
20 Vet, Breeding & Misc Livestock Exp	8872	8321	2474	2474
21 Purchase of Crops & Supp for Resale	11977	11977	6369	6369
22 Feed Bought	44030	40350	10784	10784
23 Fertilizer	15800	14775	8556	8390
24 Chemicals	13198	12034	6682	6490
25 Other Crop Expense	17944	16838	11166	11020
26 Irrigation Operation Cost			14	14
27 CW Oper Costs Excl Labor & Repair	1014	1014	673	673
28 Custom Work Hired	5827	5603	2551	2429
29 Gas, Diesel & Lubricants	8173	7664	4692	4692
30 Repair & Upkeep of Lvstk Equip	3389	3105	1023	1023
31 Repair & Upkeep of Farm Real Estate	2555	2478	1359	1359
32 Repair & Oper Mach, Trac, Trk, Auto	10471	9799	8043	8043
33 Repair & Upkeep of Irrig Equip			6	6
34 Repair & Upkeep of Custom Work Equip	570	570	1292	1292
35 Total All Repairs	16985	15953	11724	11724
36 Wages of Hired Labor	7245	7129	2697	2697
37 Personal Property & Real Est. Taxes	6018	2680	3896	1808
38 General Farm Expenses	5069	4851	3383	3383
39 Utilities	4767	4468	2346	2346
40 Farm Capital Lease Expense	4278	32863	1158	13280
41 Total Interest Payable This Year		23564		12742
42 Operator Interest Actually Paid		(23489)		(12730)
43 Total Cash Operating Expense	201295	238617	87671	109681
50 Auto, Truck & Machinery Bought	27478	26288	13477	12689
51 Irrigation Equipment Bought				
52 Custom Work Equipment Bought			1145	1145
53 Livestock Equipment Bought	4919	4710	1545	1545
54 New Real Estate: Buildings & Fences	10117	9888	4491	4491
55 New Real Estate: Land-Land Improvement	14942	13831	7870	7870
57 Total Capital Purchases	57455	54717	28528	27740
58 Total Farm Purchases	258750	293333	116199	137421
60 Decrease in Farm Capital (Not Incl Cash)				
61 Interest on Farm Capital: 7% Charge	63255	18332	40976	13388
62 Unpaid Family Labor	600	600	678	678
63 Board Furnished Hired Labor	119	119		
64 Total Farm Expense	322724	312384	157853	151487
70 Ret to Oper Labor & Mgmt(6A/62)-(64)	109604	89120	-11668	1546
71 Number of Operators	1		1	
72 Full Time Operator Equivalents	1.44		0.99	
73 Ret/Oper/Full Time Op Equiv (70/72)	76114		-11786	
74 Ret: Cap & Family Labor & Mgmt		109203		16375

CROP ACRES - TABLE 9

CROP	AVERAGE OF 450 FARMS	90 MOST PROFITABLE FARMS	90 LEAST PROFITABLE FARMS
Total Small Grain & Canning Peas	18.5	23.8	15.0
Total Row Crop	351.7	536.6	314.2
Total Legumes, Including Seed	22.1	18.4	11.1
Total Other Hay	0.9	1.0	0.9
Total Silage & Fodder	9.4	14.2	3.3
Total Tillable Pasture	0.2	0.2	
Total Commercial Vegetables	0.1		0.6
Total Roadside Mkt/Specialty Crops	0.1		0.5
Total Fallow & Set Aside Land	23.5	35.8	20.5
TOTAL TILLED LAND & RECROP ACRES	426.4	630.1	366.1
Total Non-Tillable Hay/Pasture	1.5	1.1	1.9
TOTAL LAND HARVESTED	427.9	631.2	368.0
Wild Hay Not Harvested (Non-Tillable)	1.9	2.4	1.2
Pasture Not Harvested	4.1	4.7	3.5
Timber Not Harvested	2.8	3.4	3.6
Roads & Waste	8.5	11.2	7.6
Farmstead	7.3	8.9	5.7
TOTAL LAND NOT HARVESTED	24.6	30.6	21.6
TOTAL NON-TILLABLE LAND	26.2	31.8	23.5
TOTAL LAND IN FARM OR RANCH	449.6	658.1	386.0

***** SUPPLEMENTARY MANAGEMENT INFORMATION *****

Percent Land Tillable	94.2	95.1	94.2
Fertilizer Cost per Acre	22.52	23.19	20.79
Crop Chemicals per Acre	20.29	21.36	21.61
Seed & Other Cost per Acre	29.51	29.61	32.59
Fuel & Lubricants Used per Acre	13.83	13.11	13.47
Repair & maintenance Cost per Acre	22.85	18.69	25.79
# TOTAL ACRES CROPPED	402.74	594.05	345.62

Tillable acres plus recropped acres minus tillable pasture,
fallow and idle acres.

-28-

TABLE 10 - CROP DATA PER ACRE - OATS - 1990

ITEMS		AVERAGE OF 192 FARMS	HIGHEST 38 FARMS	LOWEST 38 FARMS
1	TOTAL VALUE PRODUCED \$	1608	2923	880
2	TOTAL PRODUCTION	1002	1388	723
3	TOTAL ACRES	15.6	19.0	15.1
		PER ACRE	PER ACRE	PER ACRE
4	Yield Per Acre	64.2	73.1	47.9
5	Value Per Unit	1.01	1.01	1.03
6	Crop Product Return	64.62	73.53	49.40
7	Other Crop Income	38.46	80.32	8.87
8	Total Crop Return	103.08	153.85	58.27
	Variable Costs			
10	Fertilizer	8.72	6.89	15.10
11	Chemicals	.77	0.68	0.99
12	Seed Expense	8.72	6.95	9.54
13	Crop Drying			
14	Crop Insurance	0.83	0.68	0.93
15	Other Expenses	1.47	1.26	1.72
16	Special Hired Labor	0.26	0.11	0.13
17	Custom Work Hired Expense	7.05	7.26	6.89
18	Irrigation Operation			
19	Assigned Interest	0.77		3.97
20	Total Variable Costs	28.59	23.84	39.27
21	Return Over Variable Costs	74.49	130.01	19.00
	Allocated Costs (Variable and Fixed)			
31	Farm Power & Machinery - Ownership	12.05	16.05	10.93
32	Farm Power & Machinery - Operation	21.15	20.84	21.52
33	Building & Fence Cost	4.49	5.26	4.77
34	Irrigation Ownership Cost			
37	Actual Land Ownership or Rental Cost	56.43	56.82	54.36
38	Utilities & General Farm Expense	4.10	4.16	4.04
39	Hired Labor	2.05	3.79	1.13
41	Actual Non-Real Estate Int Allocated	8.40	6.68	11.99
42	Total Allocated Costs	108.67	113.60	108.74
43	Total Listed Costs	137.24	137.47	148.01
44	Return Over Listed Costs	-34.16	16.38	-89.74
*****SUPPLEMENTARY INFORMATION*****				
49	Fair Rental Value			
50	Land Opportunity Ownership Cost	74.51	64.16	81.47
51	Total Cost Adj to a Min 7% Interest	153.78	145.89	166.82
52	Work Units Assigned / Acre	0.30	0.30	0.30
53	Power Cost Allocation Factor	0.95	0.98	0.91
54	Total Listed Cost/Unit of Production	2.14	1.88	3.09
54A	Total Production Cost Incl Net Fam Living	2.39	2.11	3.37
55	Total Adjusted Cost/Unit of Production	2.39	2.00	3.48
56	Cash Variable Cost/Unit of Product	1.00	0.81	1.63
57	Return Over Listed Costs Per Unit	-0.53	0.22	-1.87
58	Breakeven Yield/Unit of Production	135.9	136.1	143.7
59	Total Acre Inches Water Applied			
60	Cost of Irrg Excluding Interest			
61	Average Price Received / Unit Sold	1.08	1.03	1.08
62	Quantity Sold (O.S.)	275	506	276

-30-

TABLE 10 - CROP DATA PER ACRE - WINTER WHEAT - 1990

ITEMS	AVERAGE OF 34 FARMS	HIGHEST 11 FARMS	LOWEST 11 FARMS
1 TOTAL VALUE PRODUCED \$	2985	3377	2395
2 TOTAL PRODUCTION	732	748	677
3 TOTAL ACRES	22.1	19.9	24.5
	PER ACRE	PER ACRE	PER ACRE
4 Yield Per Acre	33.1	37.6	27.6
5 Value Per Unit	2.51	2.53	2.54
6 Crop Product Return	83.17	95.03	70.08
7 Other Crop Income	51.90	74.67	27.67
8 Total Crop Return	135.07	169.70	97.75
Variable Costs			
10 Fertilizer	8.87	4.67	11.63
11 Chemicals	0.09		0.24
12 Seed Expense	10.32	9.90	10.69
13 Crop Drying			
14 Crop Insurance	2.62	2.56	2.24
15 Other Expenses	0.90	0.50	0.94
16 Special Hired Labor	0.68	0.45	1.51
17 Custom Work Hired Expense	3.26	1.21	5.80
18 Irrigation Operation			
19 Assigned Interest			
20 Total Variable Costs	26.74	19.30	33.06
21 Return Over Variable Costs	108.33	150.40	64.69
Allocated Costs (Variable and Fixed)			
31 Farm Power & Machinery - Ownership	9.19	15.88	8.69
32 Farm Power & Machinery - Operation	23.03	23.17	24.78
33 Building & Fence Cost	5.02	6.13	5.31
34 Irrigation Ownership Cost			
37 Actual Land Ownership Or Rental Cost	56.47	60.17	52.25
38 Utilities & General Farm Expense	4.16	3.82	4.04
39 Hired Labor	0.77	0.75	1.10
41 Actual Non-Real Estate Int Allocated	13.30	11.26	12.08
42 Total Allocated Costs	111.94	121.18	108.25
43 Total Listed Costs	138.69	140.45	141.31
44 Return Over Listed Costs	-3.62	29.25	-43.56
*****SUPPLEMENTARY INFORMATION*****			
49 Fair Rental Value			
50 Land Opportunity Ownership Cost	73.54	65.94	80.33
51 Total Cost Adj to a Min 7% Interest	153.08	146.83	170.00
52 Work Units Assigned / Acre	0.30	0.30	0.30
53 Power Cost Allocation Factor	0.98	1.00	0.93
54 Total Listed Cost/Unit of Production	4.19	3.74	5.12
54A Total Production Cost Incl Net Family Living	4.67	4.19	5.61
55 Total Adjusted Cost/Unit of Production	4.62	3.91	6.15
56 Cash Variable Cost/Unit of Product	2.05	1.55	2.72
57 Return Over Listed Costs Per Unit	-0.11	0.78	-1.58
58 Breakeven Yield/Unit of Production	55.3	55.5	55.6
59 Total Acre Inches Water Applied			
60 Cost of Irrg Excluding Interest			
61 Average Price Received / Unit Sold	2.37	2.35	2.32
62 Quantity Sold (O.S.)	553	361	620

-32-

TABLE 10 - CROP DATA PER ACRE - CANNING PEAS - 1990

ITEMS	AVERAGE OF 57 FARMS	HIGHEST 11 FARMS	LOWEST 11 FARMS
1 TOTAL VALUE PRODUCED \$	8357	9955	4363
2 TOTAL PRODUCTION	8269	9955	4010
3 TOTAL ACRES	32.8	26.5	35.9
	PER ACRE	PER ACRE	PER ACRE
4 Yield Per Acre	252.1	375.7	111.7
5 Value Per Unit	1.00	1.00	1.00
6 Crop Product Return	252.10	375.66	111.70
7 Other Crop Income	2.68		9.83
8 Total Crop Return	254.78	375.66	121.53
Variable Costs			
10 Fertilizer	13.87	9.62	10.42
11 Chemicals	6.55	7.77	8.13
12 Seed Expense	4.42	5.85	3.98
13 Crop Drying			
14 Crop Insurance	3.66	3.13	2.01
15 Other Expenses	0.58	0.57	0.17
16 Special Hired Labor	0.52	0.26	
17 Custom Work Hired Expense	10.43	22.38	5.65
18 Irrigation Operation			
19 Assigned Interest	3.41		0.61
20 Total Variable Costs	43.45	49.58	30.97
21 Return Over Variable Costs	211.33	326.08	90.56
Allocated Costs (Variable and Fixed)			
31 Farm Power & Machinery - Ownership	11.04	8.45	10.28
32 Farm Power & Machinery - Operation	21.49	16.83	31.56
33 Building & Fence Cost	4.97	4.04	6.96
34 Irrigation Ownership Cost			
37 Actual Land Ownership Or Rental Cost	63.09	61.43	48.36
38 Utilities & General Farm Expense	5.85	5.66	7.60
39 Hired Labor	3.20	4.91	3.90
41 Actual Non-Real Estate Int Allocated	10.09	6.23	11.03
42 Total Allocated Costs	119.73	107.55	119.69
43 Total Listed Costs	163.17	157.13	150.67
44 Return Over Listed Costs	91.61	218.53	-29.14
*****SUPPLEMENTARY INFORMATION*****			
49 Fair Rental Value			
50 Land Opportunity Ownership Cost	75.04	89.99	81.77
51 Total Cost Adj to a Min 7% Interest	170.46	186.83	186.24
52 Work Units Assigned / Acre	0.40	0.40	0.40
53 Power Cost Allocation Factor	0.86	0.76	0.99
54 Total Listed Cost/Unit of Production	0.65	0.42	1.35
54A Total Production Cost Incl Net Family Living	0.73	0.48	1.51
55 Total Adjusted Cost/Unit of Production	0.68	0.50	1.67
56 Cash Variable Cost/Unit of Product	0.33	0.22	0.76
57 Return Over Listed Costs Per Unit	0.36	0.58	-0.26
58 Breakeven Yield/Unit of Production	163.2	157.1	150.7
59 Total Acre Inches Water Applied			
60 Cost of Irrg Excluding Interest			
61 Average Price Received / Unit Sold			
62 Quantity Sold (O.S.)			

-34-

TABLE 10 - CROP DATA PER ACRE - SOYBEANS - 1990

ITEMS		AVERAGES OF 822 FARMS	HIGHEST 164 FARMS	LOWEST 164 FARMS
1	TOTAL VALUE PRODUCED \$	22791	26187	13114
2	TOTAL PRODUCTION	3839	4303	2217
3	TOTAL ACRES	88.5	84.6	67.5
		PER ACRE	PER ACRE	PER ACRE
4	Yield Per Acre	43.4	50.9	32.8
5	Value Per Unit	5.75	5.75	5.77
6	Crop Product Return	249.48	292.49	189.39
7	Other Crop Income	8.05	17.04	4.89
8	Total Crop Return	257.53	309.53	194.28
Variable Costs				
10	Fertilizer	2.08	2.23	2.04
11	Chemicals	21.56	18.95	23.61
12	Seed Expense	11.11	9.22	12.22
13	Crop Drying			
14	Crop Insurance	8.92	9.60	7.50
15	Other Expenses	1.10	1.08	1.24
16	Special Hired Labor	1.25	0.58	1.41
17	Custom Work Hired Expense	2.86	1.02	6.24
18	Irrigation Operation			
19	Assigned Interest	0.54	0.20	2.59
20	Total Variable Costs	49.41	42.87	56.86
21	Return Over Variable Costs	208.12	266.66	137.42
Allocated Costs (Variable and Fixed)				
31	Farm Power & Machinery - Ownership	17.10	22.33	14.86
32	Farm Power & Machinery - Operation	27.68	28.56	26.47
33	Building & Fence Cost	7.18	7.17	11.30
34	Irrigation Ownership Cost			
37	Actual Land Ownership Or Rental Cost	73.08	71.04	65.32
38	Utilities & General Farm Expense	7.46	6.81	7.10
39	Hired Labor	2.86	4.39	2.28
41	Actual Non-Real Estate Int Allocated	13.58	12.70	14.36
42	Total Allocated Costs	148.94	153.00	141.69
43	Total Listed Costs	198.34	195.86	198.55
44	Return Over Listed Costs	59.19	113.67	-4.27
*****SUPPLEMENTARY INFORMATION*****				
49	Fair Rental Value			
50	Land Opportunity Ownership Cost	80.28	86.56	72.82
51	Total Cost Adj to a Min 7% Interest	201.73	210.85	200.61
52	Work Units Assigned / Acre	0.45	0.45	0.45
53	Power Cost Allocation Factor	0.98	0.99	0.95
54	Total Listed Cost/Unit of Production	4.57	3.85	6.05
54A	Total Production Cost Incl Net Family Living	5.12	4.34	6.66
55	Total Adjusted Cost/Unit of Production	4.65	4.15	6.11
56	Cash Variable Cost/Unit of Product	2.33	1.87	3.26
57	Return Over Listed Costs Per Unit	1.36	2.23	-0.13
58	Breakeven Yield/Unit of Production	34.5	34.1	34.4
59	Total Acre Inches Water Applied			
60	Cost of Irrg Excluding Interest			
61	Average Price Received / Unit Sold	5.78	5.78	5.77
62	Quantity Sold (O.S.)	2663	2559	1830

-36-

TABLE 10 - CROP DATA PER ACRE - ALFALFA HAY - 1990

ITEMS	AVERAGE OF 320 FARMS	HIGHEST 64 FARMS	LOWEST 64 FARMS
1 TOTAL VALUE PRODUCED \$	10730	16444	2141
2 TOTAL PRODUCTION	134	205	27
3 TOTAL ACRES	32.3	37.6	15.8
	PER ACRE	PER ACRE	PER ACRE
4 Yield Per Acre	4.1	5.5	1.7
5 Value Per Unit	79.84	80.21	78.89
6 Crop Product Return	331.24	437.34	134.81
7 Other Crop Income	0.96		0.70
8 Total Crop Return	332.20	437.34	135.51
Variable Costs			
10 Fertilizer	16.75	10.66	8.23
11 Chemicals	0.80	0.56	0.82
12 Seed Expense	11.61	8.06	28.04
13 Crop Drying	0.80	0.53	0.32
14 Crop Insurance	0.31	0.03	0.13
15 Other Expenses	5.26	3.83	1.39
16 Special Hired Labor	1.55	0.37	3.35
17 Custom Work Hired Expense	4.95	3.27	6.14
18 Irrigation Operation			
19 Assigned Interest	0.43	0.11	4.18
20 Total Variable Costs	42.48	27.42	52.59
21 Return Over Variable Costs	289.72	409.92	82.92
Allocated Costs (Variable and Fixed)			
31 Farm Power & Machinery - Ownership	23.75	24.60	15.38
32 Farm Power & Machinery - Operation	41.55	46.57	33.54
33 Building & Fence Cost	8.58	7.87	8.54
34 Irrigation Ownership Cost			
37 Actual Land Ownership Or Rental Cost	64.27	75.70	59.26
38 Utilities & General Farm Expense	8.14	7.85	7.72
39 Hired Labor	4.71	5.85	2.66
41 Actual Non-Real Estate Int Allocated	16.04	18.64	17.15
42 Total Allocated Costs	167.04	187.08	144.25
43 Total Listed Costs	209.50	214.49	196.84
44 Return Over Listed Costs	122.70	222.85	-61.33
*****SUPPLEMENTARY INFORMATION*****			
49 Fair Rental Value			
50 Land Opportunity Ownership Cost	70.25	77.48	72.47
51 Total Cost Adj to a Min 7% Interest	213.44	212.21	198.86
52 Work Units Assigned / Acre	0.60	0.60	0.60
53 Power Cost Allocation Factor	0.95	1.00	0.79
54 Total Listed Cost/Unit of Production	51.10	39.00	115.79
54A Total Production Cost Incl Net Family Living	58.87	45.09	131.58
55 Total Adjusted Cost/Unit of Production	51.45	38.92	116.37
56 Cash Variable Cost/Unit of Product	27.54	19.33	66.86
57 Return Over Listed Costs Per Unit	29.93	40.52	-36.08
58 Breakeven Yield/Unit of Production	2.6	2.7	2.5
59 Total Acre Inches Water Applied			
60 Cost of Irrg Excluding Interest			
61 Average Price Received / Unit Sold			
62 Quantity Sold (O.S.)			

-38-

TABLE 10 - CROP DATA PER ACRE - LEGUME SILAGE & OAT SILAGE

ITEMS	LEGUME SILAGE		OAT SILAGE	
	AVE OF 17 FARMS		AVE OF 25 FARMS	
1	TOTAL VALUE PRODUCED \$	13755	2749	
2	TOTAL PRODUCTION	342	144	
3	TOTAL ACRES	40.0	28.2	
		PER ACRE	PER ACRE	
4	Yield Per Acre	8.6	5.1	
5	Value Per Unit	40.22	17.82	
6	Crop Product Return	343.88	90.99	
7	Other Crop Income		6.49	
8	TOTAL CROP RETURN	343.88	97.48	
	VARIABLE COSTS			
10	Fertilizer	23.33	6.81	
11	Chemicals	0.43		
12	Seed Expense	11.00	10.21	
13	Crop Drying			
14	Crop Insurance		0.14	
15	Other Expenses	2.43	2.41	
16	Special Hired Labor	8.05	0.71	
17	Custom Work Hired Expense	9.85	0.85	
18	Irrigation Operation			
19	Assigned Interest			
20	TOTAL VARIABLE COSTS	55.08	21.13	
21	RETURN OVER VARIABLE COSTS	288.80	76.35	
	ALLOCATED COSTS (VARIABLE AND FIXED)			
31	Farm Power & Machinery - Ownership	17.05	15.28	
32	Farm Power & Machinery - Operation	26.25	25.82	
33	Building & Fence Cost	8.63	5.18	
34	Irrigation Ownership Cost			
37	Actual Land Ownership or Rental Cost	81.33	51.08	
38	Utilities & General Farm Expense	5.30	3.90	
39	Hired Labor	0.85	1.21	
41	Actual Non-Real Estate Int Allocated	14.08	9.86	
42	TOTAL ALLOCATED COSTS	153.49	112.33	
43	TOTAL LISTED COSTS	208.55	133.48	
44	RETURN OVER LISTED COSTS	135.33	-36.00	
*****SUPPLEMENTARY INFORMATION*****				
49	Fair Rental Value			
50	Land Opportunity Ownership Cost	105.22	39.46	
51	Total Cost Adj to a Min 7% Interest	229.63	130.92	
52	Work Units Assigned / Acre	0.40	0.40	
53	Power Cost Allocation Factor	0.91	0.97	
54	Total Listed Cost/Unit of Production	24.25	26.17	
54A	Total Production Cost Incl Net Family Living	26.72	30.34	
55	Total Adjusted Cost/Unit of Production	26.86	25.64	
56	Cash Variable Cost/Unit of Product	11.81	12.14	
57	Return Over Listed Costs Per Unit	15.74	-7.06	
58	Breakeven Yield/Unit of Production	5.2	7.5	
59	Total Acre Inches Water Applied			
60	Cost of Irrg Excluding Interest			
61	Average Price Received / Unit Sold			
62	Quantity Sold (O.S.)			

COSTS AND RETURNS FROM LIVESTOCK ENTERPRISES

Productive livestock enterprises are an important part of many farm businesses in Minnesota. Farms involved in this report may have one or more livestock enterprises. The following tables pertain to these livestock enterprises.

Since feed is the largest single item of cost for all classes of livestock, return over feed costs has been used to classify farm livestock enterprises into high, low and average groups.

Other cash costs relatively easy to identify and classify in the farm records are listed in each of the tables as other direct costs.

Allocated costs include interest charges to the enterprise, allocated charges for hired labor, utilities, power and machinery, livestock equipment and building and fence costs. These costs are allocated to each livestock enterprise by the computer using a carefully devised formula to make the proper allocations.

Each enterprise table includes supplementary management information. This information can provide clues indicating the strengths and weaknesses of each enterprise.

Table 11E (Hogs, Combined Enterprises) is a new addition to the hog enterprise analysis this year. In the past many Farrow-to-Finish producers preferred to split their enterprise into two parts -- farrowing and finishing -- to get more complete data on each phase of the operation. Table 11E allows these producers to separate their enterprise and then "recombine" it to get a picture of the total hog enterprise. Table 11E is a farrow-to-finish table. Since the enterprises reported in Table 11E are also included in Tables 11B and 11C, they are not included in Table 11A.

-42-

TABLE 11A - HOGS, FARROW TO FINISH, GENERAL - 1990

ITEMS	11 FARMS HIGHEST IN RETURN OVER FEED COST		11 FARMS LOWEST IN RETURN OVER FEED COST	
		PER CWT		PER CWT
1 Production	248704		251982	
2 Net Increase in Value: Hogs		64.94		50.69
3 Other Miscellaneous Income				0.36
4 Total Value Produced		64.94		51.05
Feed Fed: Quantity & Cost	<u>LBS/CWT</u>		<u>LBS/CWT</u>	
6 Corn	306.25	11.30	299.14	12.20
7 Other Grain	5.37	0.22	1.63	0.05
8 Complete Ration	0.48	0.10	8.71	1.83
9 Prot., Salt, Min.	108.19	13.66	90.43	14.62
10 Total Grain Mix	420.29	25.28	399.91	28.70
11 Forages	0.39	0.03	0.65	0.03
12 Pasture				
13 Total Feed Cost		25.31		28.73
14 Return Over Feed Costs		39.63		22.32
Other Direct Costs				
16 Veterinary		1.56		1.21
17 Breeding				
18 Miscellaneous		0.99		1.46
19 Custom Work & Lease		1.03		0.29
20 Special Hired Labor		.91		0.01
21 Assigned Interest		.18		
22 Total Other Direct Costs		4.67		2.97
23 Total Direct Costs Incl Feed		29.98		31.70
24 Return Over All Direct Costs		34.96		19.35
Allocated Costs				
27 Act Int Pd Less Int Assigned-L21		1.48		2.32
28 General Hired Labor		0.32		1.98
29 Utilities & Miscellaneous		1.88		2.03
30 Power & Machinery		1.18		2.26
31 Livestock Equipment		2.46		1.49
32 Building & Fences		1.47		0.98
33 Total Allocated Costs		8.79		11.06
34 Total Actual Listed Costs		38.77		42.76
35 Return Over Actual Listed Costs		26.17		8.29
*****SUPPLEMENTARY MANAGEMENT INFORMATION*****				
36 Total Costs Adj To 7% Min Int.		39.98		42.88
38 Return/Listed 7% Opportunity Interest		24.96		8.17
40 Return/\$100 Feed Fed		256.66		177.69
41 Average Wt./Mkt. Hog Sold		190		237
42 Price Rec'd/CWT. Mkt Hogs		57.64		53.97
43 Total No. Litters Farrowed		180		130
44 Litters/Sow/Year		1.91		1.59
45 No. Pigs Born/Litter		9.74		10.10
46 No. Pigs Wean/Litter		8.06		8.20
47 No. Pigs Produced/Sow/Year		14.86		12.13
48 Litters/Crate/Year		7.20		6.19
49 Pigs Weaned/Crate/Year		58.04		50.76
50 Pre-Weaning Death Loss Pct		17.23		18.81
51 Nursery Death Loss Pct		2.21		1.50
52 Mkt. Death Loss Pct		1.27		1.43
53 Breeding Herd Death Loss		3.00		4.74
54 Total Death Loss Percent		13.68		13.21

-44-

TABLE 11B - HOGS, FINISHING - 1990

ITEMS	20 FARMS HIGHEST IN RETURN OVER FEED COST		20 FARMS LOWEST IN RETURN OVER FEED COST	
		PER CWT		PER CWT
1 Production - Pounds	170448		74261	
2 Net Increase in Value: Hogs		49.16		35.57
3 Other Miscellaneous Income				-1.18
4 Total Value Produced		49.16		34.39
Feed Fed: Quantity & Cost	<u>LBS/CWT</u>		<u>LBS/CWT</u>	
6 Corn	241.7	9.74	275.5	11.00
7 Other Grain	1.1	0.04	3.0	0.26
8 Complete Ration	0.3	0.25	82.2	3.86
9 Prot., Salt, Min.	73.2	10.19	79.9	12.86
10 Total Grain Mix	316.3	20.22	440.6	27.98
11 Forages				
12 Pasture				
13 Total Feed Cost		20.22		27.98
14 Return Over Feed Costs		28.94		6.41
Other Direct Costs				
16 Veterinary		0.45		0.78
17 Miscellaneous		0.39		0.55
18 Custom Work & Lease Expense		0.52		0.44
19 Special Hired Labor		0.06		
20 Assigned Interest		0.13		0.04
21 Total Other Direct Costs		1.55		1.81
22 Total Direct Costs Incl Feed		21.77		29.79
23 Return Over All Direct Costs		27.39		4.60
Allocated Costs				
26 Act Int Pd Less Int Assigned-L20		0.59		0.56
27 General Hired Labor		0.11		0.73
28 Utilities & Miscellaneous		0.82		0.96
29 Power & Machinery		0.83		0.48
30 Livestock Equipment		1.44		1.44
31 Buildings & Fences		1.36		.90
32 Total Allocated Costs		5.15		5.07
33 Total Actual Listed Costs		26.92		34.86
34 Return Over Actual Listed Costs		22.24		-0.47

*****SUPPLEMENTARY MANAGEMENT INFORMATION*****

35 Total Costs Adj to 7% Min Int.	28.15	36.70
36 Return/Listed 7% Opportunity Interest	21.01	-2.31
39 Return/\$100 Feed Fed	243.24	122.93
40 Ave Wt./Mkt. Hog Sold	225.11	235.75
41 Price Rec'd/CWT. Mkt Hogs	56.78	53.15
42 Ave. Weight/Pig Purchased	46.82	50.76
43 Ave. Price/Pig Purchased	49.95	56.41
44 No. Pigs Purchased	242	288
45 No. Pigs Transferred Out/In	675	234
46 Pounds of Pork Purchased	11330	14620
47 Ave Number of Pigs on Hand	368.0	188.4
48 Percent Death Loss	2.59	5.94
49 Effective Daily Gain	1.27	1.08
50 Price/CWT. Grain Mix Fed	6.39	6.35
51 Price/CWT. Prot., Salt, Min	13.92	16.10
52 Number of Pigs Produced	897	391

-46-

TABLE 11C - HOGS, WEANING PIG PRODUCTION - 1990

ITEMS	10 FARMS HIGHEST IN RETURN OVER FEED COST		10 FARMS LOWEST IN RETURN OVER FEED COST	
	150	/LITTER	193	/LITTER
1 Production				
2 Net Increase in Value: Hogs		551.98		330.18
3 Other Miscellaneous Income				
4 Total Value Produced		551.98		330.18
5 Feed Fed: Qty & Cost	<u>LBS/LITTER</u>		<u>LBS/LITTER</u>	
6 Corn	1373.12	53.57	1587.04	63.88
7 Other Grain	17.10	0.59	7.35	0.27
8 Complete Ration	22.13	5.00	40.62	7.83
9 Prot., Salt, Min.	602.57	97.25	699.86	124.94
10 Total Grain Mix	2014.92	156.41	2334.87	196.92
11 Forages				
12 Pasture				
13 Total Feed Cost		156.41		196.92
14 Return Over Feed Costs		395.57		133.26
Other Direct Costs				
16 Veterinary		24.82		21.48
17 Breeding				0.05
18 Miscellaneous		8.21		11.66
19 Custom Work & Lease		2.10		9.89
20 Special Hired Labor		5.10		7.97
21 Assigned Interest				1.81
22 Total Other Direct Costs		40.23		52.86
23 Total Direct Costs Incl Feed		196.64		249.78
24 Return Over All Direct Costs		355.34		80.40
Allocated Costs				
27 Act Int Pd Less Int Assigned-L21		7.68		19.21
28 General Hired Labor		4.01		7.70
29 Utilities & Miscellaneous		16.57		15.99
30 Power & Machinery		10.79		15.44
31 Livestock Equipment		20.90		18.90
32 Buildings & Fences		37.93		22.81
33 Total Allocated Costs		97.88		100.05
34 Total Actual Listed Costs		294.52		349.83
35 Return Over Actual Listed Costs		257.46		-19.65
*****SUPPLEMENTARY MANAGEMENT INFORMATION*****				
36 Total Costs Adj to 7% Min Int.		308.23		348.01
38 Return/Listed 7% Opportunity Interest		243.75		-17.83
40 Return/\$100 Feed Fed		352.91		167.68
41 Ave Wt./Pig Sold or Transfer		59		48
42 Price Rec'd/Pig Sold		56.47		48.12
43 Litters/Sow/Year		1.9		1.8
44 No. Pigs Born/Litter		11		10
45 No. Pigs Wean/Litter		9.5		7.6
46 Pigs Produced/Sow/Year		17.2		12.9
47 Litters/Crate/Year		7.9		10.7
48 Pigs Weaned/Crate/Year		75.32		81.39
49 Fdr Pig Deaths: As % of Total Loss		98.1		97.6
50 Breeding Deaths: As % of Total Loss		1.9		2.4
51 Price/CWT. Grain Mix Fed		7.76		8.43
52 Price/CWT. Prot., Salt, Min.		16.14		17.85

-48-

TABLE 11D - HOGS, MIXED SYSTEMS - 1990

ITEMS	11 FARMS HIGHEST IN RETURN OVER FEED COST		11 FARMS LOWEST IN RETURN OVER FEED COST	
		PER CWT		PER CWT
1 Production	170248		233712	
2 Net Increase in Value: Hogs		60.07		55.35
3 Other Miscellaneous Income				
4 Total Value Produced		60.07		55.35
Feed Fed: Quantity & Cost	<u>LBS/CWT</u>		<u>LBS/CWT</u>	
6 Corn	255.83	10.12	260.74	10.48
7 Other Grain	6.06	0.24	2.90	0.12
8 Complete Ration	7.71	0.56	39.64	5.07
9 Prot., Salt, Min.	79.62	13.36	76.84	12.48
10 Total Grain Mix	349.22	24.28	380.12	28.15
11 Forages	0.59	0.02	0.16	0.01
12 Pasture				
13 Total Feed Cost		24.30		28.16
14 Return Over Feed Costs		35.77		27.19
Other Direct Costs				
16 Veterinary		1.32		1.55
17 Breeding				0.06
18 Miscellaneous		1.05		1.19
19 Custom Work & Lease		0.52		0.60
20 Special Hired Labor		0.17		0.39
21 Assigned Interest				
22 Total Other Direct Costs		3.06		3.79
23 Total Direct Costs Incl Feed		27.36		31.95
24 Return Over All Direct Costs		32.71		23.40
Allocated Costs				
27 Act Int Pd Less Int Assigned-L21		1.09		1.85
28 General Hired Labor		0.57		2.20
29 Utilities & Miscellaneous		1.59		1.80
30 Power & Machinery		1.01		0.87
31 Livestock Equipment		1.90		2.19
32 Building & Fences		6.63		1.96
33 Total Allocated Costs		12.79		10.87
34 Total Actual Listed Costs		40.15		42.82
35 Return Over Actual Listed Costs		19.92		12.53

*****SUPPLEMENTARY MANAGEMENT INFORMATION*****

36 Total Costs Adj To % Min Int.	42.92	43.74
38 Return/Listed 7% Opportunity Interest	17.15	11.61
40 Return/\$100 Feed Fed	247.16	196.58
41 Ave Wt./Mkt. Hog Sold	171	184
42 Price Rec'd/CWT. Mkt Hogs	60.94	75.13
43 Total No. Litters Farrowed	113	144
44 Litters/Sow/Year	1.92	1.80
45 No. Pigs Born/Litter	9.95	9.68
46 No. Pigs Wean/Litter	8.93	8.42
47 No. Pigs Produced/Sow/Year	16.69	14.19
48 Litters/Crate/Year	7.06	6.55
49 Pigs Weaned/Crate/Year	63.06	55.09
50 Pre-Weaning Death Loss Pct	10.14	13.06
51 Nursery Death Loss Pct	1.49	2.64
52 Mkt. Death Loss Pct	0.60	3.31
53 Breeding Herd Death Loss	3.12	6.02
54 Total Death Loss Percent	8.78	12.84

-50-

TABLE 11E - HOGS - COMBINED ENTERPRISE - 1990

ITEMS	10 FARMS HIGHEST IN RETURN OVER FEED COST		10 FARMS LOWEST IN RETURN OVER FEED COST	
		PER CWT		PER CWT
1 Production	332339		266882	
2 Net Increase in Value: Hogs		61.88		52.53
3 Other Miscellaneous Income				
4 Total Value Produced		61.88		52.53
Feed Fed: Quantity & Cost	LBS/CWT		LBS/CWT	
6 Corn	260.68	10.08	305.05	12.20
7 Other Grain	1.11	0.04		
8 Complete Ration	1.33	0.35	3.83	0.69
9 Prot., Salt, Min.	90.78	13.12	108.70	16.76
10 Total Grain Mix	353.90	23.59	417.58	29.65
11 Forages	0.12			
12 Pasture				
13 Total Feed Cost		23.59		29.65
14 Return Over Feed Costs		38.29		22.88
Other Direct Costs				
16 Veterinary		2.03		1.67
17 Breeding				
18 Miscellaneous		1.00		0.97
19 Custom Work & Lease		0.29		0.67
20 Special Hired Labor		0.02		0.77
21 Assigned Interest		0.74		
22 Total Other Direct Costs		4.08		4.08
23 Total Direct Costs Incl Feed		27.67		33.73
24 Return Over All Direct Costs		34.21		18.80
Allocated Costs				
27 Act Int Pd Less Int Assigned-L21		0.38		1.37
28 General Hired Labor		0.12		1.13
29 Utilities & Miscellaneous		1.59		1.72
30 Power & Machinery		1.09		1.27
31 Livestock Equipment		2.29		1.83
32 Building & Fences		3.05		2.51
33 Total Allocated Costs		8.52		9.83
34 Total Actual Listed Costs		36.19		43.56
35 Return Over Actual Listed Costs		25.69		8.97

*****SUPPLEMENTARY MANAGEMENT INFORMATION*****

36 Total Costs Adj to 7% Min Int	37.54	44.40
38 Return/Listed 7% Opportunity Interest	24.34	8.13
40 Return/\$100 Feed Fed	262.33	177.23
41 Ave Wt./Mkt. Hog Sold	231.67	229.71
42 Price Rec'd/CWT. Mkt Hogs	55.97	54.47
43 Total No. Litters Farrowed	245	161
44 Litters/Sow/Year	1.98	1.85
45 No. Pigs Born/Litter	10.49	9.51
46 No. Pigs Wean/Litter	8.89	7.80
47 No. Pigs Produced/Sow/Year	16.95	12.55
48 Litters/Crate/Year	9.42	10.06
49 Pigs Weaned/Crate/Year	83.73	78.50
50 Mkt. Animal Death as % of Total Loss	34.67	46.51
51 Breeding Herd Death Loss	4.54	8.66
52 Price/CWT. Grain Mix Fed	6.66	7.10
53 Price/CWT. Prot., Salt, Min.	14.45	15.42
54 Total Death Loss Percent		

-52-

TABLE 12 - DAIRY COWS, COMMERCIAL - 1990

ITEMS	31 FARMS HIGHEST IN RETURN OVER FEED COST		31 FARMS LOWEST IN RETURN OVER FEED COST	
		PER COW		PER COW
1 Average Number of Cows	46.8		41.0	
2 Pounds of Milk		19408		14445
3 Pounds of Butterfat		722		521
4 Percent of Butterfat in Milk		3.72		3.60
5 Value of Produce				
6 Dairy Products Sold		2637.84		1825.93
7 Dairy Products Used in Home		4.42		2.95
8 Milk Fed to Livestock		18.59		3.37
9 Net Increase in Value:		-84.62		-156.37
10 Other Miscellaneous Income		8.93		1.85
11 Total Value Produced		2585.16		1677.73
12 Feed Fed: Qty & Cost	<u>LBS/COW</u>		<u>LBS/COW</u>	
13 Corn	5547	220.68	5889	234.34
14 Small Grain	367	15.51	308	12.07
15 Complete Ration	412	28.12	85	5.63
16 Prot., Salt, Min.	1868	290.43	1502	267.12
17 Total Grain Mix	8194	554.74	7784	519.16
18 Legume Hay	5301	219.79	6174	264.66
19 Other Dry Hay & Roughage	175	3.89	1349	21.66
20 Haylage	4438	85.62	2217	46.44
21 Silage	8613	84.29	9393	102.61
22 Pasture		3.61		0.01
23 Total Feed Costs		951.94		955.31
24 Return Over Feed Cost		1633.22		722.42
Other Direct Costs				
26 Veterinary		70.60		44.66
27 Breeding		35.15		19.88
28 Miscellaneous		136.37		108.49
29 Custom Work & Lease Expense		85.96		66.12
30 Special Hired Labor		25.11		10.27
31 Assigned Interest				
32 Total Other Direct Costs		353.19		249.42
33 Total Direct Costs Incl. Feed		1305.13		1204.73
34 Return Over All Dir Costs		1280.03		473.00
Allocated Costs				
37 Int Pd Less Int Assgnd-L31		77.82		100.78
38 General Hired Labor		75.98		31.83
39 Utilities & Miscellaneous		101.45		84.34
40 Power & Machinery		73.30		60.27
41 Livestock Equipment		99.89		56.67
42 Building & Fences		139.10		71.98
43 Total Allocated Costs		567.54		405.87
44 Tot Act Listed Costs		1872.67		1610.60
45 Return Over Actual Listed Costs		712.49		67.13
*****SUPPLEMENTARY MANAGEMENT INFORMATION*****				
46 Total Costs Adj To 7% Int		1918.43		1627.80
47 Return/Listed 7% Opportunity Interest		666.73		49.93
50 Return/\$100 Feed Fed		271.57		175.62
51 LBS of Milk/LBS Grain Mix		2.37		1.86
52 Average Price/CWT. Sold		13.72		12.68
53 Dairy Cow Turnover %		42.74		36.59
54 Approx Dry Matter/Cow		46		47

-54-

TABLE 13 - OTHER DAIRY CATTLE, COMMERCIAL REPLACEMENTS - 1990

ITEMS	30 FARMS HIGHEST IN RETURN OVER FEED COST		30 FARMS LOWEST IN RETURN OVER FEED COST	
		PER HEAD		PER HEAD
1 Average Number of Head	53.0		61.0	
2 Net Increase in Value:		554.00		290.39
3 Other Miscellaneous Income		0.04		
4 Total Value Produced		554.04		290.39
Feed Fed: Quantity & Cost	<u>LBS/HEAD</u>		<u>LBS/HEAD</u>	
6 Corn	864	34.43	1404	55.87
7 Small Grain	105	3.74	172	6.43
8 Complete Ration	128	6.17	7	2.98
9 Prot., Salt, Min.	215	39.91	257	48.13
10 Total Grain Mix	1312	84.25	1840	113.41
11 Legume Hay	1402	59.00	2574	112.77
12 Other Dry Hay & Roughage	836	16.38	727	13.98
13 Haylage	796	17.15	621	12.77
14 Silage	4012	40.38	4589	46.75
15 Milk	50	5.13	14	2.28
16 Pasture		0.43		1.95
17 Total Feed Costs		222.72		303.91
18 Return Over Feed Cost		331.32		-13.52
Other Direct Costs				
20 Veterinary		10.75		6.87
21 Breeding		8.45		4.49
22 Miscellaneous		15.15		8.13
23 Custom Work & Lease Expense		3.47		2.43
24 Special Hired Labor		1.00		1.36
25 Assigned Interest		0.25		
26 Total Other Direct Costs		39.07		23.28
27 Total Direct Costs Incl Feed		261.79		327.19
28 Return Over All Direct Costs		292.25		-36.80
Allocated Costs				
31 Int Pd Less Int Assigned-L25		18.13		15.34
32 General Hired Labor		16.62		6.33
33 Utilities & Miscellaneous		17.19		13.43
34 Power & Machinery		11.97		11.81
35 Livestock Equipment		14.59		11.78
36 Buildings & Fences		19.44		12.09
37 Total Allocated Costs		97.94		70.78
38 Total Actual Listed Costs		359.73		397.97
39 Return Over Actual Listed		194.31		-107.58
*****SUPPLEMENTARY MANAGEMENT INFORMATION*****				
40 Total Costs Adj 7% Int		420.37		428.27
42 Return/Listed 7% Opportunity Int		133.67		-137.88
44 Return/\$100 Feed Fed		248.76		95.55
45 Percent Calf Death Loss		8.96		13.88

-56-

TABLE 14 - ALL DAIRY CATTLE - 1990

ITEMS	29 FARMS HIGHEST IN RETURN OVER FEED COST		29 FARMS LOWEST IN RETURN OVER FEED COST	
	PER COW		PER COW	
1 Average Number of Cows	48.5		43.5	
2 Pounds of Milk		19245.11		14621.79
3 Pounds of Butterfat		719.11		529.83
4 Percent of Butterfat in Milk		3.74		3.62
5 Value of Produce				
6 Dairy Products Sold		2605.98		1860.67
7 Dairy Products Used in Home		4.37		3.06
8 Milk Fed to Livestock		15.07		1.75
9 Net Increase in Value:		450.54		278.94
10 Other Miscellaneous Income		7.84		0.55
11 Total Value Produced		3083.80		2144.97
12 Feed Fed: Quantity & Cost	LBS/COW		LBS/COW	
13 Corn	6512	259.22	7110	282.74
14 Small Grain	464	17.48	501	19.26
15 Complete Ration	738	38.02	213	12.99
16 Protein, Salt, Mineral	2269	356.47	1720	312.07
17 Total Grain Mix	9983	671.19	9544	627.06
18 Legume Hay	7281	295.03	9725	422.55
19 Other Dry Hay & Roughage	1024	22.31	2380	43.38
20 Haylage	4772	94.72	2863	61.98
21 Silage	14647	149.86	14618	152.69
22 Pasture		7.01		1.56
23 Total Feed Costs		1240.12		1309.22
24 Return Over Feed Costs		1843.68		835.75
Other Direct Costs				
26 Veterinary		67.24		56.78
27 Breeding		46.12		26.25
28 Miscellaneous		133.40		114.94
29 Custom Work & Lease Expense		97.75		62.53
30 Special Hired Labor		28.19		11.82
31 Assigned Interest		0.58		2.37
32 Total Other Direct Costs		373.28		274.69
33 Total Direct Costs Incl Feed		1613.40		1583.91
34 Return Over All Direct Costs		1470.40		561.06
Allocated Costs				
37 Int Paid Less Int Assigned-L-31		90.89		126.37
38 General Hired Labor		66.35		38.30
39 Utilities & Miscellaneous		126.00		100.11
40 Power & Machinery		91.86		78.01
41 Livestock Equipment		115.81		73.79
42 Buildings & Fences		162.16		84.24
43 Total Allocated Costs		653.07		500.82
44 Total Actual Listed Costs		2266.47		2084.73
45 Return/Actual Listed Costs		817.33		60.24
*****SUPPLEMENTARY MANAGEMENT INFORMATION*****				
46 Total Costs Adj to 7% Interest		2394.49		2264.98
47 Return/Listed 7% Opportunity Int		689.31		-120.01
50 Return/\$100 Feed Fed		249		164
51 LBS of Milk/LBS Grain Mix		1.93		1.53
52 Average Price/CWT Milk Sold		13.64		12.76
53 Dairy Cow Turnover %		45.36		39.08
54 Approx Dry Matter/Cow		63		68
55 Percent Calf Death Loss		11.45		19.26
56 Total Investment/Cow		10499.65		9064.51
57 Total Debt/Cow		3446.60		4247.40

-58-

TABLE 15B - FEEDLOT - 1990

ITEMS	15 FARMS HIGHEST IN RETURN OVER FEED COST		15 FARMS LOWEST IN RETURN OVER FEED COST	
		PER CWT		PER CWT
1 Average Number of Animals	70.1		46.0	
2 Pounds of Animal Produced	48411		33381	
3 Net Increase in Value: Animals		76.50		52.54
4 Other Miscellaneous Income		0.06		
5 Total Value Produced		76.44		52.54
6 Feed Fed: Qty & Cost	<u>LBS/CWT</u>		<u>LBS/CWT</u>	
7 Corn	479.8	18.77	669.2	26.29
8 Small Grains	0.7	0.02	3.2	0.12
9 Complete Rations	0.6	0.17	1.6	0.55
10 Prot., Salt, Min.	40.9	5.41	58.3	9.13
11 Legume Hay	48.4	1.76	120.5	5.13
12 Other Dry Hay & Roughage	16.2	0.31	56.1	0.77
13 Silage	234.0	2.34	398.8	3.99
14 Haylage	136.5	2.98	6.0	0.12
15 Pasture				0.03
16 Total Feed Cost		31.76		46.13
17 Return Over Feed Costs		44.44		6.41
Other Direct Costs				
19 Veterinary		1.81		2.07
20 Miscellaneous		1.09		0.95
21 Custom Work & Lease Expense		3.31		1.38
22 Special Hired Labor				
23 Assigned Interest		1.56		0.87
24 Total Other Direct Costs		7.77		5.27
25 Total Direct Costs Incl Feed		39.53		51.40
26 Return Over All Direct Costs		36.91		1.14
27 Allocated Costs				
29 Act Int Pd Less Int Assigned-L23		3.89		2.50
30 General Hired Labor		2.49		.49
31 Utilities & Miscellaneous		2.53		1.65
32 Power & Machinery		1.26		0.89
33 Livestock Equipment		2.80		1.38
34 Buildings & Fences		1.99		1.20
35 Total Allocated Costs		14.96		8.11
36 Total Actual Listed Costs		54.49		59.51
37 Return Over Actual Listed Costs		21.95		-6.97
*****SUPPLEMENTARY MANAGEMENT INFORMATION*****				
38 Total Costs Adj to 7% Min Int		55.98		63.77
39 Return/Listed 7% Opportunity Int.		20.46		-11.23
42 Return/\$100 Feed Fed		240.63		113.90
43 Price/CWT Sold		75.17		71.12
44 Average Weight All Cattle Sold		1147		1051
45 Price/CWT Bought		85.15		96.10
46 Average Weight Cattle Bought		617		393
47 Number of Head Bought		90		45
48 Percent Death Loss		2.06		5.29
49 Effective Daily Gain-Pound/Head/Day		1.89		1.99
50 Price to Cover Purch Price & Listed		152.11		110.39
51 Hay Equivalent/CWT		0.11		0.16
52 Corn Equivalent/CWT		8.58		12.01

-60-

TABLE 15B - FEEDLOT DAIRY BEEF - 1990

ITEMS	11 FARMS HIGHEST IN RETURN OVER FEED COST		11 FARMS LOWEST IN RETURN OVER FEED COST	
		<u>PER CWT</u>		<u>PER CWT</u>
1 Average Number of Animals	56.1		43.2	
2 Pounds of Animal Produced	49175		30701	
3 Net Increase in Value: Animals		66.17		60.99
4 Other Miscellaneous Income				
5 Total Value Produced		66.17		60.99
6 Feed Fed: Qty & Cost	<u>LBS/CWT</u>		<u>LBS/CWT</u>	
7 Corn	492.5	19.93	638.4	25.60
8 Small Grains	7.1	0.26	4.1	0.15
9 Complete Rations	2.0	0.70	1.7	0.61
10 Prot., Salt, Min.	26.3	6.91	57.4	10.51
11 Legume	46.4	1.69	71.7	2.63
12 Other Dry Hay Roughage	29.6	0.46	46.5	0.86
13 Silage	34.9	0.35		
14 Haylage				
15 Pasture		0.02		
16 Total Feed Cost		30.32		40.36
17 Return Over Feed Costs		35.85		20.63
Other Direct Costs				
19 Veterinary		2.33		1.94
20 Miscellaneous		2.66		1.78
21 Custom Work & Lease Expense		0.63		1.34
22 Special Hired Labor				
23 Assigned Interest		0.07		0.06
24 Total Other Direct Costs		5.69		5.12
25 Total Direct Costs Incl Feed		36.01		45.48
26 Return Over All Direct Costs		30.16		15.51
27 Allocated Costs				
29 Act Int Pd Less Int Assigned-L23		5.86		1.69
30 General Hired Labor		0.77		0.58
31 Utilities & Miscellaneous		1.95		1.29
32 Power & Machinery		1.30		0.99
33 Livestock Equipment		2.43		1.60
34 Buildings & Fences		2.10		1.30
35 Total Allocated Costs		14.41		7.45
36 Total Actual Listed Costs		50.42		52.93
37 Return Over Actual Listed Costs		15.75		8.06

*****SUPPLEMENTARY MANAGEMENT INFORMATION*****

38 Total Costs Adj to 7% Min Int	50.59	59.56
39 Return/Listed 7% Opportunity Int.	15.58	1.43
42 Return/\$100 Feed Fed	218.28	151.14
43 Price/CWT Sold	69.81	70.41
44 Average Weight All Cattle Sold	1101	1109
45 Price/CWT Bought	113.72	132.77
46 Average Weight Cattle Bought	179	163
47 Number of Head Bought	57	15
48 Percent Death Loss	5.15	4.49
49 Effective Daily Gain-Pound/Head/Day	2.40	1.95
50 Price to Cover Purch Price & Listed	74.08	63.54
51 Hay Equivalent/CWT	0.04	0.06
52 Corn Equivalent/CWT	8.92	11.47

-62-

TABLE 16 - SHEEP FLOCK, COMMERCIAL

AVERAGE OF 8 FARMS

		FLOCK TOTAL	PER EWE
1	Average Number of Ewes	40.2	
2	Pounds of Lamb, Mutton Produced	5289	
3	Pounds of Wool Produced	298	
4	Value of Produce		
5	Wool		2.89
6	Net Increase in Value		34.45
7	Other Miscellaneous Income		
8	Total Value Produced	1501 *	37.34*
9	Feed Fed: Quantity & Cost		
	LBS/EWE		
10	Grain	429.1	18.18
11	Prot., Salt, Min.	62.0	10.25
12	Legume Hay	802.9	26.29
13	Other Dry Hay and Roughage	352.0	6.17
14	Silage	8.7	0.10
15	Haylage		
16	Pasture		
17	Total Feed Cost	2452	60.99
18	Return Over Feed Costs	-951 *	-23.65*
	Other Direct Costs:		
20	Veterinary		4.05
21	Breeding		0.17
22	Miscellaneous		2.46
23	Custom Work		2.09
24	Lease Expense		
25	Special Hired Labor		1.92
26	Assigned Interest		
27	Total Other Direct Costs	430	10.69
28	Total Direct Costs Including Feed	2882	71.68
29	Return Over All Direct Costs	-1381 *	-34.34*
30	Allocated Costs		
32	Act Int Pd Less Int Assigned-L26	285	7.09
33	General Hired Labor		0.35
34	Utilities & Miscellaneous		6.87
35	Power & Machinery	-PCAF 0.91	4.02
36	Livestock Equipment	-ECAF 0.78	12.63
37	Buildings & Fences	-BCAF 0.78	8.04
38	Total Allocated Costs	1568	39.00
39	Total Actual Listed Costs	4450	110.68
40	Return Over Actual Listed Costs	-2949 *	-73.34*
	***** SUPPLEMENTARY MANAGEMENT INFORMATION *****		
41	Total Listed Costs Adj to 7% Min Int.	4510	112.19
42	Return/Listed 7% Opportunity Interest	-3009	-74.85
45	Return/\$100 Feed Fed	61.22	
46	Price/CWT Lamb Sold or Transferred	46.09	
47	Ave Wt. Lamb Sold or Transferred	134	
48	LBS. Wool/Sheep Sheared	13.5	
49	Number of Ewes Exposed	35	
50	Number of Ewes Lambing	39	
51	Conception Rate	111.4	
52	Number of Lambs Born	50	
53	Percent Born/Ewe Exposed	142.9	
54	Percent Born/Ewe Lambing	128.2	
55	Percent Weaned/Ewe Lambing	112.8	
56	Percent Ewe Death Loss: % Total Death Loss	2.1	
57	Percent Lamb Death Loss: % Total Death Loss	4.3	

-64-

TREND ANALYSIS - TABLE 600 (Continued)

* * * CROP DATA (Selected) * * *	1986	1987	1988	1989	1990
OATS, FEED					
Number of Records	106	172	179	219	192
1 Total Acres	17.6	18.7	17.9	18.1	15.6
2 Crop Yield/Acre	58.0	49.3	41.0	68.3	64.2
3 Value/Unit	0.85	1.50	2.75	1.41	1.01
4 Total Variable Costs/Acre	22.21	25.35	29.06	31.10	28.59
5 Total Listed Costs/Acre	127.64	125.35	148.83	137.96	137.24
6 Return Over Listed Costs/Acre	-27.47	-23.37	-13.22	1.99	-34.16
7 Total Listed Costs/Unit of Production	2.20	2.55	3.63	2.02	2.14
SPRING WHEAT					
Number of Records	79	118	97	88	108
1 Total Acres	25.5	22.3	17.5	22.7	22.3
2 Crop Yield/Acre	37.8	30.3	26.4	41.8	35.4
3 Value/Unit	2.35	2.45	3.95	3.92	2.86
4 Total Variable Costs/Acre	42.67	38.52	44.07	46.39	40.22
5 Total Listed Costs/Acre	155.09	142.29	159.45	159.38	151.93
6 Return Over Listed Costs/Acre	2.37	-24.80	-30.33	35.51	6.32
7 Total Listed Costs/Unit of Production	4.10	4.69	6.03	3.81	4.29
CORN, GRAIN					
Number of Records	354	483	638	770	921
1 Total Acres	117.8	106.4	86.3	95.0	97.3
2 Crop Yield/Acre	135.0	143.0	80.8	139.7	134.1
3 Value/Unit	1.30	1.62	2.49	2.01	2.00
4 Total Variable Costs/Acre	99.26	91.71	99.60	105.23	108.24
5 Total Listed Costs/Acre	236.12	231.80	266.29	260.97	273.65
6 Return Over Listed Costs/Acre	-3.96	87.12	-41.83	59.05	30.52
7 Total Listed Costs/Unit of Production	1.75	1.62	3.30	1.87	2.04
SOYBEANS					
Number of Records	337	447	575	649	822
1 Total Acres	102.7	110.4	86.8	90.7	88.5
2 Crop Yield/Acre	39.8	44.0	29.8	43.6	43.4
3 Value/Unit	4.50	4.80	7.70	5.46	5.75
4 Total Variable Costs/Acre	41.37	44.49	50.85	52.12	49.41
5 Total Listed Costs/Acre	166.60	172.16	198.04	191.06	198.34
6 Return Over Listed Costs/Acre	16.52	42.12	42.06	47.59	59.19
7 Total Listed Costs/Unit of Production	4.18	3.91	6.65	4.38	4.57
ALFALFA HAY					
Number of Records	159	240	291	296	320
1 Total Acres	37.4	39.1	35.5	35.8	32.3
2 Crop Yield/Acre	4.3	4.2	2.1	3.5	4.1
3 Value/Unit	65.00	62.76	97.07	80.10	79.84
4 Total Variable Costs/Acre	35.21	35.55	34.01	40.89	42.48
5 Total Listed Costs/Acre	175.92	172.35	198.61	203.04	209.50
6 Return Over Listed Costs/Acre	103.58	92.89	21.63	79.76	122.70
7 Total Listed Costs/Unit of Production	40.62	40.84	93.24	58.01	51.10

-66-

TREND ANALYSIS - TABLE 600 (Continued)

	1986	1987	1988	1989	1990
PRODUCING FEEDER PIGS - TABLE 11C					
Number of Records	30	42	41	48	50
1 Number of Litters Produced	149	116	127	132	176
2 Price Rec'd/Pig Sold	66.16	64.21	44.07	40.77	50.14
3 Total Listed Cost/Litter	260.97	235.83	332.08	328.35	307.62
4 Return Over Listed Cost/Litter	125.00	133.31	-4.05	-12.56	116.79
5 Return/\$100 Feed Fed	256.40	261.48	170.86	170.11	254.41
6 Pounds of Feed/Litter	2179.5	2202.5	2313.5	2180.5	2091.9
7 Number of Pigs Weaned/Litter	7.8	7.6	8.3	8.1	8.4

DAIRY COWS - TABLE 12

Number of Records	92	136	144	137	153
1 Pounds of Milk Produced/Cow	15063	15430	16092	16410	16580
2 Price Rec'd/Cwt Milk Sold	11.72	11.89	11.54	12.78	13.40
3 Total Listed Cost/Cow	1233.55	1179.60	1599.60	1634.99	1706.22
4 Return Over Listed Cost/Cow	427.15	584.55	179.29	384.36	420.26
5 Return/\$100 Feed Fed	240.20	264.57	223.83	228.10	230.15
6 Total Feed Cost/Cow	691.38	666.79	794.74	885.28	923.95
7 Total Listed Cost/Cwt Milk	8.19	7.64	9.94	9.97	10.28

OTHER DAIRY - TABLE 13

Number of Records	91	136	141	137	149
1 Average Number of Head	61.4	60.5	61.8	60.5	60.5
2 Total Value Produced/Head	307.44	347.88	383.90	397.25	398.69
3 Total Listed Cost/Head	270.85	263.88	353.68	360.08	370.11
4 Return Over Listed Cost/Head	36.59	83.98	30.22	37.17	28.58
5 Return/\$100 Feed Fed	151.59	175.57	165.45	159.65	155.67
6 Total Feed Cost/Head	202.82	198.15	232.03	248.83	256.11
7 % Calf Death Loss	15.1	15.1	8.1	11.6	13.2

ALL DAIRY - TABLE 14

Number of Records	93	140	148	137	144
1 Average Number of Cows	50.3	50.7	53.4	50.2	49.5
2 Feed Cost/Cow	936.37	912.29	1075.51	1185.16	1230.08
3 Return Over All Listed Costs/Cow	473.32	695.68	120.95	429.14	446.29
4 Dairy Cow Turnover (%)	--	--	37.45	37.85	38.38
5 Total Dry Matter/Cow	--	--	58	42	62
6 Total Investment/Cow	--	--	7907.88	8739.71	9332.87
7 Total Debt/Cow	--	--	3614.31	3714.99	3620.81

BEEF FEEDERS - TABLE 15B

Number of Records	44	78	87	75	74
1 Pounds of Beef Produced	31729	44651	43675	52749	57093
2 Price/Cwt Sold	54.31	61.10	65.74	69.00	73.60
3 Total Listed Cost/Cwt	49.22	38.27	53.82	55.05	55.82
4 Return Over Listed Cost/Cwt	6.19	21.86	9.64	6.53	10.82
5 Return/\$100 Feed Fed	154.27	212.57	160.59	158.94	173.05
6 Feed Cost/Cwt Produced	35.92	28.29	39.52	38.74	38.52
7 Average Weight All Cattle Sold	1135	1186	1190	1197	1170

EXPLANATION OF WORK UNITS AND ANIMAL UNITS

The total "work units" for any one farm is a measure of the size of that farm business. Originally, a "unit of work" represented the average accomplishment of a farm worker in a ten hour day working on crops and productive livestock at an average efficiency. With today's facilities and mechanization the relationship to a ten hour day may not be relevant. However, the work unit itself remains a viable method of measuring accomplishment and provides a stable means of comparing size of dissimilar farm businesses with different enterprises. The work unit concept also provides a rational method for allocating input costs based on relative input requirements. The number of work units for each class of livestock and each acre of crop are presented below.

NUMBER OF WORK UNITS FOR EACH CLASS OF LIVESTOCK & EACH ACRE OF CROP

NUMBER OF WORK UNITS FOR EACH CLASS OF LIVESTOCK & EACH ACRE OF CROPS			
Item	No. of Work Units	Item	No. of Work Units/Acre
Dairy Cow Purebred	7.2/cow	Barley, Wheat, Oats, Rye	.30/acre
Dairy Cow	7.0/cow	Canning Peas	.40/acre
Other Dairy Cattle		Oat Silage	.40/acre
Commercial Replacements	1.2/head	Canning Corn	.50/acre
Other Dairy Cattle		Corn for Grain, Sunflowers	.55/acre
Purebred Replacements	1.3/head	Soybeans	.45/acre
Beef Breeding	1.5/cow	Corn and Cane Silage	.60/acre
Beef Feeders	12/cwt.	Alfalfa Hay	.60/acre
Hogs - Complete	.12/cwt.	Other Legume and Mixed Hay	.40/acre
Hogs - Finishing	.06/cwt.	Tame Grass Hay	.30/acre
Hogs - Weaning Pigs	1.4/litter	Annual Hay	.40/acre
Sheep - Farm Flock	.60/ewe	Legume and Grass Silage	
Lambs - Feeder	.30/cwt.	or Haylage	.40/acre
Chickens - Laying Flock, Farm	5.0/100	Legume and Grass Seed	.50/acre
Chickens - Laying Flock, Commercial	4.0/100	Summer Fallow Tilled	.20/acre
Broilers	.20/cwt.	Wild Hay	.20/acre
Labor off the Farm	1.0/\$40	Set Aside Acres Idle	.05/acre

"Animal units" indicate density of livestock on a farm. Feed requirement is the basis for assigning unit value to the various classes of livestock as follows:

Dairy Cow	1.0 unit per cow
Other Dairy Cattle	.5 unit per head
Beef Breeding Cows and Bulls	.8 unit per head
Other Beef Breeding	.3 unit per head
Feeder Steers and Heifers	1.0 unit per head
Hogs (swine over 6 months old)	.4 unit per hog
Pigs (swine less than 6 months old)	.2 unit per pig
Sheep (6 months or older)	.143 unit per head
Lambs (under 6 months)	.071 unit per head
Laying Hens	.005 unit per head
Broilers	.003 unit per head