

Minnesota and North Dakota  
Farm Business Management Education

# Red River Valley 2008 Report



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Minnesota Farm Business Management Education  
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RED RIVER VALLEY AVERAGES  
2008 ANNUAL REPORT

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2008 Red River Valley Report  
Minnesota and North Dakota Farm Business Management Education

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# INTRODUCTION

This report summarizes the individual farm records of farms in the Red River Valley that are enrolled in Farm Management Education programs. The current financial status of farm operators and net returns from each crop enterprise is reported. In addition to the average of all farms, the averages for the high and low net income groups are also presented. To insure anonymity, only averages of five or more farms are reported. Regional averages reports can be used by producers for comparison purposes to identify and study the areas that may need management improvement. A review of the comparative information may reveal how certain aspects of the business or enterprises excel and help answer why they are profitable. The data contained in this report should also be useful to instructors, extension agents, bankers and agricultural consultants.

The Red River Valley averages reports are divided into two major categories. Explanatory notes precede the farm operators' reports and the crop reports.

The 2008 Red River Valley Report is based upon data generated by individual farm analysis completed by farm/ranch families enrolled in the Farm and Ranch Business Management Education programs in Minnesota and North Dakota. The tables in this report were created using FINPACK and RankEm Central copyrighted software of the Center for Farm Financial Management, University of Minnesota.

You may contact Ron Dvergsten, Northland Community and Technical College, Highway 1 East, Thief River Falls, MN 56701, phone: (218) 681-0797, to order a copy of this report. This report and regional reports for north central, south central and western North Dakota can be ordered for \$5 per copy from Farm Business Management, PO Box 6022, Bismarck, ND 58506-6022, phone: (701) 224-8390. A state average book for North Dakota farms is also available.

## EXPLANATORY NOTES FOR THE FARM OPERATORS' REPORTS

The tables include the same number of farms, which were all of the farms whose records were judged to be of sufficient quality to be included in the overall report. However, the balance sheets include only sole proprietors. Partnerships and corporations are excluded because some debt is held outside of the business causing potential misinterpretations of the financial statement. The number of farms included in each of the crop tables varies because all farms do not have the same enterprises. Also, some farmers' records were complete enough to be included in the whole-farm tables, but at times, these same farmers' crop records were not complete enough to include in the respective crop tables.

Rounding of individual items for the report may have caused minor discrepancies with the printed totals which are calculated before rounding.

### Farm Income Statement

This statement is a summary of income, expenses, or resultant profit or loss from farming operations during the calendar year.

The first section of the table lists cash farm income from all sources. There are three possible sources of cash income from crops. The first is income from cash sales. The second is income from crops stored under government loan programs when the loan is treated as income for the year in which the crop was stored. If the crop value has not been entered as income when it was stored, then it would be treated as cash income in the year it was sold. The third is Net Government Sales, which refers to the difference between income credited in the year a crop was stored and the actual cash income received at the time it was sold. There are two categories of cash income from livestock sales. "Raised" steer, hogs, and lambs refer to animals raised from birth to market weight on the farm. "Finished" animals refers to those purchased as feeders and fed to market weight. The "Direct & CC govt payments" are decoupled from crop production but the counter-cyclical payment is coupled to national average prices. "LDP payments" are loan deficiency payments that may be received on production when local prices are below the county loan rate for the crop. "Other government payments" refers to all other government payments such as disaster payments but not including CRP payments.

The second section of the income statement lists cash expenses. "Labor" includes only labor hired. "Interest" includes only interest actually paid. No opportunity charges on farm equity capital or unpaid labor are included.

The difference between "Gross Cash Farm Income" and "Total Cash Expenses" is the "Net Cash Farm Income." This is net farm income on a cash basis.

The last two sections of the income statement deal with the non-cash changes in the farm business. The "Inventory Changes" and "Depreciation and Other Capital Adjustments" sections are used to convert the cash income statement (Net Cash Farm Income) derived from the first two sections into an accrual income statement. The bottom line, labeled "Net farm Income," represents the return to the operator's and family's unpaid labor, management, and equity capital (net worth). In other words, it represents the return to all of the resources that are owned by the farm family and hence, not purchased or paid a wage. However, it does not include any debt forgiveness or asset repossessions.

### Inventory Changes

This is the detailed statement of inventory changes that is summarized in the income statement. It includes beginning and ending inventories and the calculated changes.

## Depreciation and Other Capital Adjustments

This is the detailed statement of depreciation and other capital adjustments that is summarized in the income statement. It includes beginning and ending inventories, sales, purchases, and depreciation.

## Profitability Measures

This table shows profitability when capital assets are valued at cost. Various measures of performance are calculated. In the previous tables no opportunity costs are used. In this table, opportunity costs for labor, capital, and management are used. The measures and their components are described below.

"**Labor and management earnings**" equals "Net farm income" minus an opportunity interest cost of 6% on average farm net worth.

"**Rate of return on assets**" is the "Return on farm assets" divided by "Average farm assets."

"**Rate of return on equity**" is the "Return of farm equity" divided by "Average farm equity."

"**Operating profit margin**" is the "Return on farm assets" divided by "Value of farm production."

"**Asset turnover rate**" is the "Value of farm production" divided by "Average farm assets."

"**Interest on farm net worth**" is the "Average farm equity" multiplied by a 6% opportunity interest cost charge.

"**Farm interest expense**" is the accrual interest cost, usually it will be different from the cash interest expense.

"**Value of operator's labor and management**" is an opportunity cost for unpaid operator's labor and management that is used in the calculation of several financial performance measures. A value of \$18,000 per full time operator plus 5% of value of farm production is used.

"**Return of farm assets**" is calculated by adding "Farm interest expense" to "Net farm income" and then subtracting the "Value of operator's labor and management."

"**Average farm assets**" is the average of beginning and ending total farm assets.

"**Return on farm equity**" is calculated by subtracting the "Value of operator's labor and management" from "Net farm income."

"**Average farm equity**" is the average of beginning and ending farm net worth.

"**Value of farm production**" is gross cash farm income minus purchased feed and feeder livestock and adjusted for inventory changes in crops, market livestock, accounts receivable and breeding livestock.

## Liquidity Measures

### Liquidity (Cash Basis)

"**Family living and taxes**" is calculated cash family living plus income and social security taxes.

"**Cash available for intermediate debt**" on the cash basis is the sum of "Net cash farm income" and "Net nonfarm income" minus "Family living and taxes" and "Real estate principal payments."

"**Average intermediate debt**" is the average of beginning and ending intermediate farm liabilities.

"**Years to turn over debt**" is "Average intermediate debt" divided by "Cash available for intermediate debt." If the cash-based or accrual-based "Cash available for intermediate debt" is a negative number, debt repayment is not possible because of negative cash flow on a cash or accrual basis, respectively, and "Years to turn over intermediate debt" cannot be calculated.

Cash "**Expense as a percent of income**" is "Total cash expense" divided by "Gross cash farm income."

"**Interest as a percent of income**" is "Interest paid" divided by "Gross cash farm income"

### **Liquidity (Accrual Basis)**

"**Available for intermediate debt**" on the accrual basis is "Net accrual operating income" plus "Net nonfarm income" minus "Family living and taxes" and "Real estate principal payments."

Accrual "**Expense as a percent of income**" is "Total cash expense" adjusted by inventory changes in accounts payable, accrued expense items, prepaid expenses and growing crops divided by "Gross farm income." "Gross farm revenue" is "Gross cash farm income" adjusted by changes in inventories of crops and feed, feeder livestock and accounts receivable.

"**Interest as a percent of income**" is "Interest paid" adjusted by changes in accrued interest for the year, divided by "Gross farm revenue."

### **Balance Sheets**

The ending balance sheet statements and solvency measures are presented for sole proprietors only. Current assets are valued at market price at the time of the inventory which is December 31. In balance sheet at cost values, intermediate and long-term assets that are depreciable are valued at cost remaining (amount remaining to be depreciated, plus salvage value). Raised breeding livestock is valued at conservative market replacement costs. Land is valued at cost or conservative market value. In balance sheet at market values, the intermediate and long term assets are listed at market value, and deferred income tax liabilities are estimated.

### **Statement of Cash Flows**

This statement organizes cash inflows and outflows by the following three categories: Operating activities, investing activities, and financing activities.

### **Financial Standards Measures**

This table contains the 16 measures of financial performance recommended by the Farm Financial Standards Task Force (FFSTF). The Finpack financial management program complies with nearly all of the FFSTF recommendations for calculating the financial guidelines measures. The measures are calculated on an accrual basis. These measures are grouped by Liquidity, Solvency, Profitability, Repayment Capacity and Efficiency.

#### **Liquidity**

Liquidity is the ability of the farm business to meet financial obligations in a timely manner, without disrupting normal business operations.



**"Current ratio"** is "Total current farm assets" divided by "Total current farm liabilities."

The current ratio shows the value of current assets relative to current liabilities. It measures the extent current farm assets, if liquidated, would cover liabilities that are due during the next 12 months. The higher the ratio, the safer the short term position.

**"Working capital"** is "Total current farm assets" less "Total current farm liabilities."

Working capital shows the dollar amount that current assets can or cannot cover current liabilities. It approximates the amount of capital available to purchase crop and livestock inputs and equipment necessary to produce farm products. The amount of working capital considered adequate must be related to the size of the farm business.

### **Solvency**

Solvency is important in evaluating the risk position of the farm and family and in considering future borrowing capacity. Solvency measures the ability of the business to pay off all debts if liquidated.

**"Farm debt to asset ratio"** is "Total farm liabilities" divided by "Total farm assets."

The farm debt to asset ratio measures the financial position or solvency of the farm or ranch by comparing the total liabilities to the total assets. It measures the portion of the farm assets that have debt against them. A higher ratio is considered an indicator of greater financial risk.

**"Farm equity to asset ratio"** is "Total farm assets" minus "Total farm liabilities," divided by "Total farm assets."

The farm equity to asset ratio measures the farm equity relative to the value of the farm assets. It measures the proportion of the farm assets financed by the owner's equity whereas the debt to asset ratio measured the proportion of farm assets financed by debt.

**"Farm debt to equity ratio"** is "Total farm liabilities," divided by the result of "Total farm assets" minus "Total farm liabilities."

The farm debt to equity ratio measures the amount of farm debt relative to the amount of farm equity. It measures the amount of debt the farm has for every dollar of equity the farm has.

### **Profitability**

Profitability is the measure of the value of goods produced by the business in relation to the cost of resources used in the production. Profitability calculated on a cost basis does not consider changes in market valuation of capital assets such as machinery and breeding livestock.

**"Rate of return on farm assets"** is "Net farm income" plus "interest expense" minus "Value of operator's labor and management," divided by the average of beginning and ending "Total farm assets."

Rate of return on assets is, in effect, the interest rate your farm earned in the past year on all money invested in the business. If assets are valued at market value, the rate of return on investment can be looked at as the "opportunity cost" of investing money in the farm instead of alternative investments. If assets are valued at cost (cost less depreciation), the rate of return represents the actual return on the average dollar invested in the business.

**"Rate of return on farm equity"** is "Net farm income" minus "Value of operator's labor and

management," divided by the average of beginning and ending farm net worth.

Rate of return on equity is, in effect, the interest rate your investment in the business earned in the past year. If assets are valued at market value, this return can be compared with returns available if the assets were liquidated and invested in alternative investments. If assets are valued at cost, this represents the actual return to the amount of equity capital you have invested in the farm business.

If your return on assets is higher than your average interest rate, your return on equity will be still higher, reflecting the fact that there are residual returns to equity capital after paying all interest expense. This is positive use of financial leverage. If your return on assets is lower than your average interest rate, your return on equity will be still lower, reflecting the fact that borrowed capital did not earn enough to pay its interest cost. This is negative financial leverage. As your debt to asset ratio increases, these relationships become more pronounced. So profitability becomes a key concern when substantial debt capital is used in the business.

**Net farm income** represents the returns to labor, management, and equity capital invested in the business. Without income from other sources, or appreciation of capital asset values, net farm income must cover family living expenses and taxes, or net worth will decrease.

**"Operating profit margin"** is "Net farm income" plus "interest expense" minus "Value of operator's labor and management," divided by "Value of farm production."

The operating profit margin is a measure of the profit margin from the employment of assets. It measures how effectively you are employing assets relative to the value of output produced. Low prices, high operating expenses, or production problems are all possible causes of a low operating profit margin.

### **Repayment Capacity**

Repayment capacity measures the ability to repay term debt (longer than one year) and to replace capital assets.

**"Term debt coverage ratio"** is "Net farm income" plus "depreciation and other capital adjustments" plus "Net nonfarm income" plus scheduled interest on term debt minus "Family living and taxes," divided by scheduled term debt principal and interest payments.

The term debt coverage ratio measures the ability of the business to cover all term debt payments. A number less than 100 percent indicates that the business, plus non-farm income, is not generating sufficient cash to meet all of the debt payments, after family living expenses and taxes have been paid. A number greater than 100 indicates the business is generating sufficient cash to pay all term debt obligations with some surplus margin remaining.

**"Capital replacement margin"** is "Net farm income" plus "Depreciation and other capital adjustments" plus "Net nonfarm income" minus "Family living and taxes" and scheduled term debt principal payments.

The capital replacement margin is the amount of money remaining from farm and non-farm income after all operating expenses, taxes, family living and debt payments have been paid. It is the amount available for acquiring capital assets, such as machinery and land, or servicing additional debt.

### **Efficiency**

These measures reflect the relationships between expense and income items to revenue and the efficiency of the farm business with regard to the use of cash and capital assets.

**"Asset turnover rate"** is "Value of farm production" divided by the average of beginning and ending "Total farm assets."

Asset turnover is a measure of how efficiently assets are used in the business. A farm with good operating profit margin and asset turnover will show a strong rate of return on farm assets. If operating profit margin is low, the asset turnover rate must be strong, or vice versa, to maintain the rate of return on assets.

**"Operating expense ratio"** is total expense less "Farm interest expense" and "Depreciation and capital adjustment," divided by "Gross farm revenue."

This ratio indicates the percent of the gross farm income which is used to pay the operating expenses. Operating expenses do not include interest or depreciation expense.

**"Depreciation expense ratio"** is "Depreciation and capital adjustments" divided by "Gross farm revenue."

This ratio indicates the percent of the gross farm income which is used to cover the depreciation expense.

**"Interest expense ratio"** is "Farm interest expense" divided by "Gross farm revenue"

This ratio indicates the percent of the gross farm income which is used to pay farm interest expenses.

**"Net farm income ratio"** is "Net farm income" divided by "Gross farm revenue."

This ratio indicates the percent of the gross farm income which remains after all expenses.

## **Crop Production and Marketing Summary**

This table contains three sections. The first section reports averages for total acres owned, crop land by tenure and total pasture acres. The next two sections show average price received and average yields for major crops. These tables are sorted on the basis of "Net farm income."

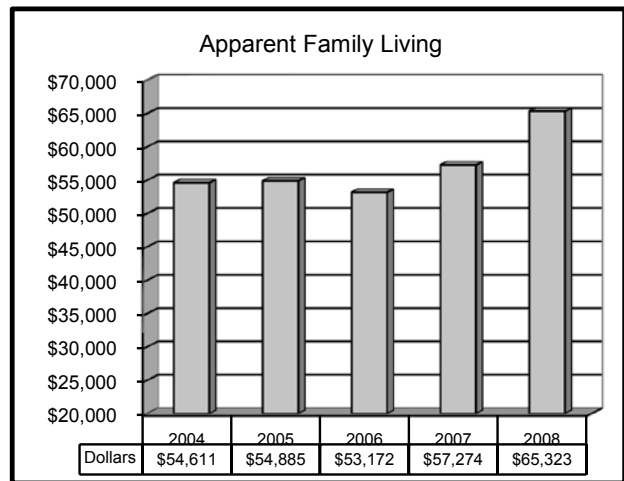
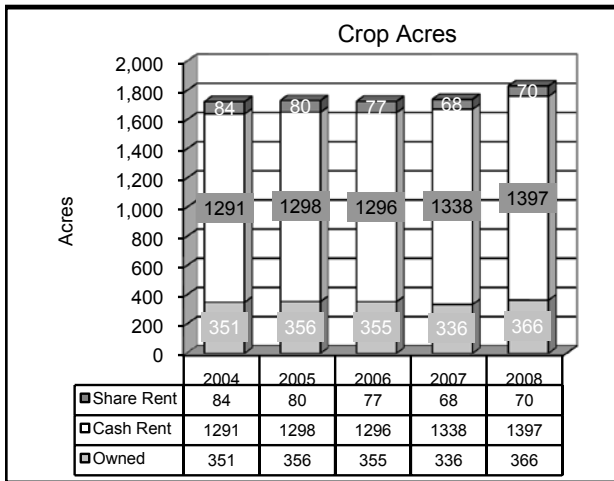
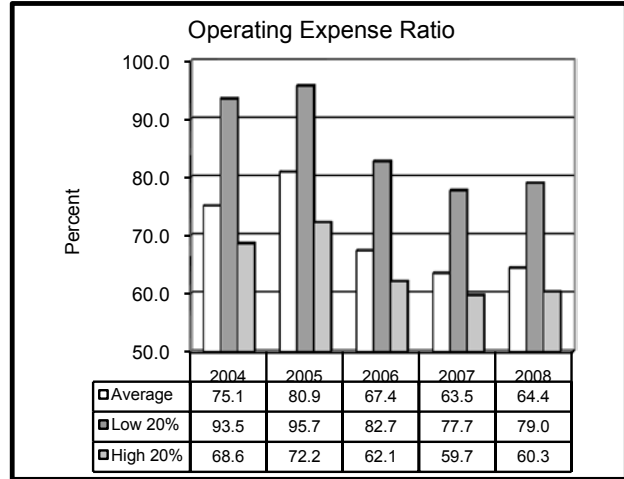
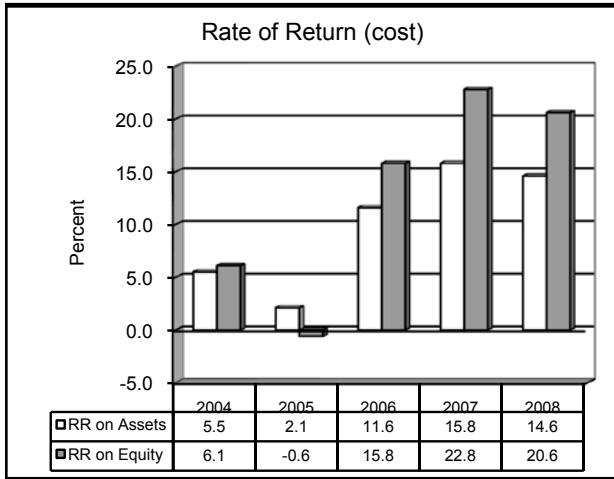
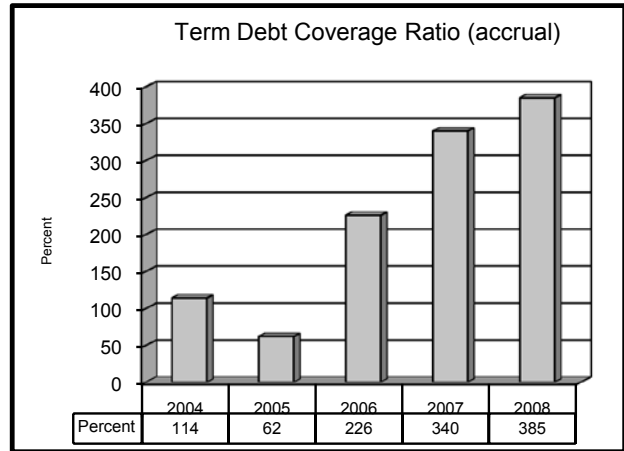
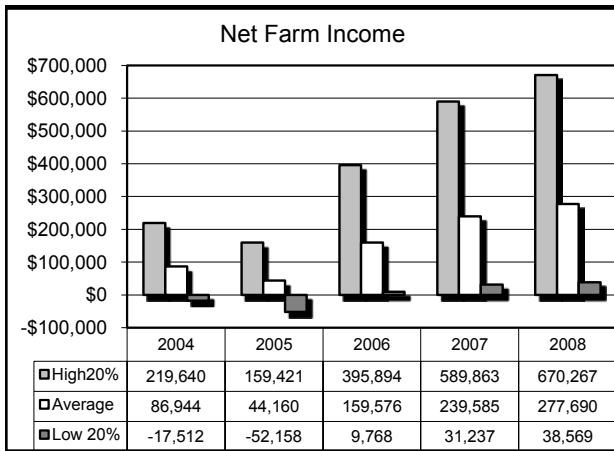
## **Operator and Labor Information**

This table reports the average for the number of operators per farm, the operator's age, and the number of years farming.

## **Nonfarm Summary**

This table also reports the income from nonfarm income, but the figure reported is the average over all farms not just those reporting nonfarm income.

## Five Year Trend of Financial Measures Red River Valley Farm Business Management Education



**Farm Income Statement**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Cash Farm Income</b>				
Barley	3,472	218	2,573	3,205
Beans, Black Turtle	3,451	-	3,096	8,645
Beans, Cranberry	249	-	-	1,239
Beans, Dark Red Kidney	4,060	-	-	5,925
Beans, Navy	4,637	1,524	302	10,684
Beans, Pink	618	-	2,139	938
Beans, Pinto	4,934	1,289	2,680	14,189
Canola	248	-	-	1,232
Corn	151,112	57,212	127,204	291,192
Flax	233	-	-	-
Hay, Alfalfa	468	244	94	1,744
Oats	125	-	105	518
Potatoes	10,506	-	-	5,472
Soybeans	211,172	89,402	187,858	420,284
Soybeans Seed	886	-	-	4,412
Straw	1,569	-	6,615	511
Sugar Beets	188,445	68,072	145,675	396,633
Sunflowers	8,027	3,398	9,179	14,970
Sunflowers, Confectionary	3,848	-	5,998	3,988
Wheat, Spring	162,943	46,271	126,820	347,400
Wheat, Winter	157	211	-	577
Sunflowers, Seed	589	-	-	2,931
Soybeans, Organic	2,632	405	9,180	1,708
Soybeans, Food	2,716	-	2,476	875
Barley, Organic	496	-	1,925	-
Corn, Organic	169	-	-	-
Hay, Alfalfa, Organic	850	-	767	-
Oats, Organic	73	96	271	-
Sunflowers, Organic	70	-	349	-
Wheat, Spring, Organic	745	-	2,943	-
Corn, Blue, Organic	287	-	1,427	-
Miscellaneous crop income	87	14	-	120
Beef Cow-Calf, Beef Calves	277	-	242	-
Beef Backgrounding	364	486	-	-
Beef Finishing	1,018	-	4,353	-
Dairy Finishing	181	504	-	-
Hogs, Farrow To Finish, Raised Ho	2,157	-	-	-
Hogs, Finish Feeder Pigs	170	-	-	-
Cull breeding livestock	120	122	-	-
Misc. livestock income	109	156	-	-
Direct & CC govt payments	26,664	10,680	23,109	52,478
CRP payments	1,628	299	2,672	3,033
Other government payments	8,241	3,079	9,162	12,706
Custom work income	5,592	1,471	6,267	9,736
Patronage dividends, cash	9,704	2,055	8,140	20,348
Insurance income	39,052	16,632	46,757	65,544
Other farm income	32,574	15,572	29,674	59,423
<b>Gross Cash Farm Income</b>	<b>897,727</b>	<b>319,414</b>	<b>770,054</b>	<b>1,762,662</b>

**Farm Income Statement (Continued)**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Cash Farm Expense</b>				
Seed	76,296	29,788	68,747	147,561
Fertilizer	127,549	38,829	89,295	287,879
Crop chemicals	70,628	23,385	58,184	146,143
Crop insurance	46,269	18,429	39,783	93,496
Drying expense	8,055	1,805	9,031	12,688
Storage	127	28	135	225
Crop custom hire	189	59	884	-
Crop hauling and trucking	898	-	1,307	1,767
Marketing	3,498	822	322	3,985
Crop miscellaneous	4,495	4,123	1,311	12,481
Feeder livestock purchase	794	160	3,166	-
Purchased feed	1,448	312	1,475	12
Supplies	190	171	185	12
Livestock hauling and trucking	117	-	-	-
Interest	37,770	16,417	37,341	69,012
CCC buyback	12,341	11,379	6,151	23,212
Fuel & oil	55,414	22,613	51,752	104,096
Repairs	58,081	25,979	52,759	104,003
Custom hire	14,137	5,862	12,158	28,359
Hired labor	30,445	5,115	24,356	68,798
Land rent	106,347	41,889	96,493	209,025
Stock/quota lease	18,288	7,110	20,361	31,735
Machinery leases	9,714	7,317	4,269	21,798
Building leases	1,187	21	430	1,849
Real estate taxes	5,221	2,049	5,317	10,250
Farm insurance	9,371	3,838	8,530	15,932
Utilities	6,867	3,558	6,028	10,628
Dues & professional fees	6,253	2,916	5,366	11,625
Organic certification	45	19	115	-
Miscellaneous	6,908	4,300	6,413	11,255
Total cash expense	718,942	278,292	611,665	1,427,826
Net cash farm income	178,784	41,122	158,390	334,835
<b>Inventory Changes</b>				
Prepays and supplies	34,655	341	3,659	120,771
Accounts receivable	7,412	3,465	-4,633	15,875
Growing crops	33	166	-	-
Hedging accounts	2,350	-4,114	-1,060	16,458
Other current assets	1,423	-353	-1,331	6,496
Crops and feed	102,832	21,458	96,538	261,723
Market livestock	-199	-343	97	-
Breeding livestock	-84	-180	-144	-
Other assets	2,067	-4,654	546	8,392
Accounts payable	-6,605	-3,145	1,345	-10,448
Accrued interest	509	-2,872	1,424	5,590
Total inventory change	144,392	9,770	96,443	424,858
Net operating profit	323,177	50,892	254,832	759,693
<b>Depreciation</b>				
Machinery and equipment	-40,638	-11,394	-36,745	-80,437
Titled vehicles	-3,154	-2,689	-2,676	-4,409
Buildings and improvements	-2,399	-602	-3,152	-4,580
Total depreciation	-46,191	-14,685	-42,572	-89,426
Net farm income from operations	276,986	36,208	212,260	670,267
Gain or loss on capital sales	705	2,361	181	-
Net farm income	277,690	38,569	212,441	670,267

**Inventory Changes**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
Net cash farm income	178,784	41,122	158,390	334,835
<b>Crops and Feed</b>				
Ending inventory	487,554	147,535	373,613	1,142,132
Beginning inventory	384,722	126,076	277,074	880,409
Inventory change	102,832	21,458	96,538	261,723
<b>Market Livestock</b>				
Ending inventory	1,621	1,508	345	-
Beginning inventory	1,820	1,851	248	-
Inventory change	-199	-343	97	-
<b>Accts Receivable</b>				
Ending inventory	57,259	20,041	48,888	90,333
Beginning inventory	49,847	16,576	53,521	74,458
Inventory change	7,412	3,465	-4,633	15,875
<b>Prepaid Expenses and Supplies</b>				
Ending inventory	106,206	25,229	69,989	263,733
Beginning inventory	71,551	24,887	66,331	142,961
Inventory change	34,655	341	3,659	120,771
<b>Growing Crops</b>				
Ending inventory	601	166	-	250
Beginning inventory	417	-	1,331	425
Inventory change	184	166	-1,331	-175
<b>Hedging Activities</b>				
Ending inventory	4,995	697	2,558	13,121
Withdrawals	7,329	47	2,124	27,060
Beginning inventory	3,673	321	886	8,326
Deposits	6,301	4,537	4,857	15,397
Gain or loss	2,350	-4,114	-1,060	16,458
<b>Other Current Assets</b>				
Ending inventory	2,051	506	243	8,042
Beginning inventory	780	859	243	1,370
Inventory change	1,271	-353	-	6,672
<b>Breeding Livestock</b>				
Ending inventory	1,724	1,074	923	44
Capital sales	57	-	40	-
Beginning inventory	1,655	978	895	44
Capital purchases	209	277	213	-
Depreciation, capital adjust	-84	-180	-144	-
<b>Other Capital Assets</b>				
Ending inventory	222,811	69,956	175,369	494,135
Capital sales	8,296	3,505	286	18,009
Beginning inventory	219,075	73,744	173,819	478,807
Capital purchases	9,965	4,371	1,290	24,945
Depreciation, capital adjust	2,067	-4,654	546	8,392
<b>Accounts Payable</b>				
Beginning inventory	26,475	9,170	25,854	50,525
Ending inventory	33,080	12,314	24,508	60,973
Inventory change	-6,605	-3,145	1,345	-10,448
<b>Accrued Interest</b>				
Beginning inventory	17,540	6,291	18,915	35,249
Ending inventory	17,017	9,119	17,491	29,659
Inventory change	509	-2,872	1,424	5,590
Total inventory change	144,392	9,770	96,443	424,858
Net operating profit	323,177	50,892	254,832	759,693

**Depreciation**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
Net operating profit	323,177	50,892	254,832	759,693
<b>Machinery and Equipment</b>				
Ending inventory	415,650	137,088	405,709	757,305
Capital sales	8,711	2,547	5,711	26,657
Beginning inventory	352,724	111,789	344,424	656,438
Capital purchases	112,287	39,240	103,741	207,962
Depreciation, capital adjust.	-40,638	-11,394	-36,745	-80,437
<b>Titled Vehicles</b>				
Ending inventory	25,046	21,998	18,978	43,285
Capital sales	620	815	135	1,423
Beginning inventory	21,253	19,356	16,072	32,557
Capital purchases	7,566	6,146	5,717	16,560
Depreciation, capital adjust.	-3,154	-2,689	-2,676	-4,409
<b>Buildings and Improvements</b>				
Ending inventory	93,218	28,342	87,997	198,100
Capital sales	100	213	-	-
Beginning inventory	74,347	25,319	78,718	149,300
Capital purchases	21,369	3,838	12,431	53,380
Depreciation, capital adjust.	-2,399	-602	-3,152	-4,580
Total depreciation, capital adj.	-46,191	-14,685	-42,572	-89,426
Net farm income from operations	276,986	36,208	212,260	670,267
Gain or loss on capital sales	705	2,361	181	-
Net farm income	277,690	38,569	212,441	670,267



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**Profitability Measures**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

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	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Profitability (assets valued at cost)</b>				
Net farm income from operations	276,986	36,208	212,260	670,267
Rate of return on assets	14.6 %	4.6 %	13.0 %	18.0 %
Rate of return on equity	20.6 %	3.2 %	18.9 %	25.0 %
Operating profit margin	24.7 %	8.3 %	22.5 %	29.9 %
Asset turnover rate	59.0 %	55.2 %	57.7 %	60.1 %
Farm interest expense	37,262	19,289	35,917	63,422
Value of operator lbr and mgmt.	64,234	27,683	55,954	114,039
Return on farm assets	250,013	27,814	192,223	619,649
Average farm assets	1,713,635	605,246	1,481,728	3,446,319
Return on farm equity	212,752	8,525	156,306	556,228
Average farm equity	1,031,196	262,320	828,153	2,224,052
Value of farm production	1,011,285	334,222	855,429	2,071,594

**Liquidity & Repayment Capacity Measures**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Liquidity</b>				
Current ratio	1.89	1.40	1.68	2.19
Working capital	236,981	64,255	201,540	416,604
Working capital to gross inc	23.4 %	19.2 %	23.4 %	20.1 %
Current assets	503,618	226,407	497,776	767,937
Current liabilities	266,637	162,152	296,236	351,333
Gross revenues (accrual)	1,013,528	334,694	860,069	2,071,606
<b>Repayment capacity</b>				
Net farm income from operations	276,986	36,208	212,260	670,267
Depreciation	46,191	14,685	42,572	89,426
Personal income	17,926	26,267	19,177	11,280
Family living/owner withdrawals	-65,323	-47,767	-59,074	-91,733
Payments on personal debt	-4,988	-5,080	-4,852	-4,769
Income taxes paid	-15,859	-7,900	-15,726	-20,815
Interest on term debt	24,593	10,858	25,541	45,731
Capital debt repayment capacity	279,772	27,269	219,898	699,388
Scheduled term debt payments	-72,669	-32,208	-73,428	-136,987
Capital debt repayment margin	207,103	-4,939	146,470	562,401
Cash replacement allowance	-14,137	-2,691	-13,755	-24,635
Replacement margin	192,966	-7,629	132,715	537,766
Term debt coverage ratio	3.85	0.85	2.99	5.11
Replacement coverage ratio	3.22	0.78	2.52	4.33

**Balance Sheet at Cost Values**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	206	47	45	27
<b>Assets</b>				
<b>Current Farm Assets</b>				
Cash and checking balance	28,679	16,075	5,787	115,367
Prepaid expenses & supplies	85,262	25,229	69,068	227,129
Growing crops	697	166	-	444
Accounts receivable	50,285	20,041	48,005	79,866
Hedging accounts	3,157	697	2,651	8,960
Crops held for sale or feed	383,717	152,969	360,119	880,543
Crops under government loan	28,445	9,216	45,071	39,575
Market livestock held for sale	1,800	1,508	-	-
Other current assets	2,254	506	259	13,336
<b>Total current farm assets</b>	<b>584,295</b>	<b>226,407</b>	<b>530,961</b>	<b>1,365,221</b>
<b>Intermediate Farm Assets</b>				
Breeding livestock	1,791	1,074	27	78
Machinery and equipment	354,016	137,088	392,832	678,580
Titled vehicles	22,905	21,998	18,707	37,265
Other intermediate assets	148,336	61,593	150,258	344,924
<b>Total intermediate farm assets</b>	<b>527,048</b>	<b>221,754</b>	<b>561,823</b>	<b>1,060,846</b>
<b>Long Term Farm Assets</b>				
Farm land	369,009	172,065	385,044	663,019
Buildings and improvements	83,503	28,342	88,117	201,463
Other long-term assets	30,846	8,362	25,262	55,406
<b>Total long-term farm assets</b>	<b>483,358</b>	<b>208,769</b>	<b>498,423</b>	<b>919,889</b>
<b>Total Farm Assets</b>	<b>1,594,701</b>	<b>656,930</b>	<b>1,591,206</b>	<b>3,345,957</b>
<b>Total Nonfarm Assets</b>	<b>203,166</b>	<b>118,189</b>	<b>213,408</b>	<b>374,082</b>
<b>Total Assets</b>	<b>1,797,867</b>	<b>775,119</b>	<b>1,804,614</b>	<b>3,720,039</b>
<b>Liabilities</b>				
<b>Current Farm Liabilities</b>				
Accrued interest	15,958	9,126	17,414	29,953
Accounts payable	26,812	12,314	25,014	40,233
Current notes	201,630	108,983	197,075	434,776
Government crop loans	14,100	4,335	22,159	20,384
Principal due on term debt	51,162	27,393	54,323	99,246
<b>Total current farm liabilities</b>	<b>309,351</b>	<b>162,152</b>	<b>315,985</b>	<b>624,592</b>
<b>Total intermediate farm liabs</b>	<b>146,139</b>	<b>90,720</b>	<b>158,212</b>	<b>264,442</b>
<b>Total long term farm liabilities</b>	<b>225,254</b>	<b>134,901</b>	<b>218,967</b>	<b>367,477</b>
<b>Total farm liabilities</b>	<b>681,055</b>	<b>387,773</b>	<b>693,163</b>	<b>1,256,511</b>
<b>Total nonfarm liabilities</b>	<b>55,924</b>	<b>50,917</b>	<b>63,321</b>	<b>87,623</b>
<b>Total liabilities</b>	<b>736,979</b>	<b>438,690</b>	<b>756,484</b>	<b>1,344,135</b>
<b>Net worth (farm and nonfarm)</b>	<b>1,060,888</b>	<b>336,429</b>	<b>1,048,130</b>	<b>2,375,904</b>
<b>Net worth change</b>	<b>165,651</b>	<b>17,436</b>	<b>144,324</b>	<b>509,877</b>
<b>Ratio Analysis</b>				
Current farm liabilities / assets	53 %	72 %	60 %	46 %
Intermediate farm liab. / assets	28 %	41 %	28 %	25 %
Long term farm liab. / assets	47 %	65 %	44 %	40 %
Total debt to asset ratio	41 %	57 %	42 %	36 %

**Balance Sheet at Market Values**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	206	47	45	27
<b>Assets</b>				
<b>Current Farm Assets</b>				
Cash and checking balance	28,679	16,075	5,787	115,367
Prepaid expenses & supplies	85,262	25,229	69,068	227,129
Growing crops	697	166	-	444
Accounts receivable	50,285	20,041	48,005	79,866
Hedging accounts	3,157	697	2,651	8,960
Crops held for sale or feed	383,717	152,969	360,119	880,543
Crops under government loan	28,445	9,216	45,071	39,575
Market livestock held for sale	1,800	1,508	-	-
Other current assets	2,254	506	259	13,336
<b>Total current farm assets</b>	<b>584,295</b>	<b>226,407</b>	<b>530,961</b>	<b>1,365,221</b>
<b>Intermediate Farm Assets</b>				
Breeding livestock	1,680	1,157	27	78
Machinery and equipment	452,796	172,250	503,575	912,323
Titled vehicles	27,133	26,061	20,693	44,553
Other intermediate assets	198,587	80,799	204,841	464,099
<b>Total intermediate farm assets</b>	<b>680,196</b>	<b>280,266</b>	<b>729,136</b>	<b>1,421,053</b>
<b>Long Term Farm Assets</b>				
Farm land	505,947	231,457	554,170	907,306
Buildings and improvements	99,156	32,829	115,791	234,976
Other long-term assets	33,040	8,305	32,649	59,219
<b>Total long-term farm assets</b>	<b>638,143</b>	<b>272,591</b>	<b>702,609</b>	<b>1,201,501</b>
<b>Total Farm Assets</b>	<b>1,902,634</b>	<b>779,264</b>	<b>1,962,705</b>	<b>3,987,776</b>
<b>Total Nonfarm Assets</b>	<b>229,980</b>	<b>135,410</b>	<b>237,418</b>	<b>455,958</b>
<b>Total Assets</b>	<b>2,132,613</b>	<b>914,674</b>	<b>2,200,123</b>	<b>4,443,734</b>
<b>Liabilities</b>				
<b>Current Farm Liabilities</b>				
Accrued interest	15,958	9,126	17,414	29,953
Accounts payable	26,812	12,314	25,014	40,233
Current notes	201,630	108,983	197,075	434,776
Government crop loans	14,100	4,335	22,159	20,384
Principal due on term debt	51,162	27,393	54,323	99,246
<b>Total current farm liabilities</b>	<b>309,351</b>	<b>162,152</b>	<b>315,985</b>	<b>624,592</b>
<b>Total intermediate farm liab</b>	<b>146,139</b>	<b>90,720</b>	<b>158,212</b>	<b>264,442</b>
<b>Total long term farm liabilities</b>	<b>225,254</b>	<b>134,901</b>	<b>218,967</b>	<b>367,477</b>
<b>Total farm liabilities</b>	<b>681,055</b>	<b>387,773</b>	<b>693,163</b>	<b>1,256,511</b>
<b>Total nonfarm liabilities</b>	<b>55,924</b>	<b>50,917</b>	<b>63,321</b>	<b>87,623</b>
<b>Total liab excluding deferreds</b>	<b>736,979</b>	<b>438,690</b>	<b>756,484</b>	<b>1,344,135</b>
<b>Total deferred liabilities</b>	<b>208,495</b>	<b>70,139</b>	<b>219,156</b>	<b>500,384</b>
<b>Total liabilities</b>	<b>945,474</b>	<b>508,829</b>	<b>975,640</b>	<b>1,844,519</b>
<b>Retained earnings</b>	<b>1,060,888</b>	<b>336,429</b>	<b>1,048,130</b>	<b>2,375,904</b>
<b>Market valuation equity</b>	<b>126,251</b>	<b>69,416</b>	<b>176,353</b>	<b>223,311</b>
<b>Net worth (farm and nonfarm)</b>	<b>1,187,139</b>	<b>405,845</b>	<b>1,224,483</b>	<b>2,599,216</b>
<b>Net worth excluding deferreds</b>	<b>1,395,634</b>	<b>475,984</b>	<b>1,443,639</b>	<b>3,099,599</b>
<b>Net worth change</b>	<b>200,646</b>	<b>25,988</b>	<b>174,083</b>	<b>634,305</b>
<b>Ratio Analysis</b>				
Current farm liabilities / assets	53 %	72 %	60 %	46 %
Intermediate farm liab. / assets	21 %	32 %	22 %	19 %
Long term farm liab. / assets	35 %	49 %	31 %	31 %
Total debt to asset ratio	44 %	56 %	44 %	42 %
Debt to assets excl deferreds	35 %	48 %	34 %	30 %

**Statement Of Cash Flows**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
Beginning cash (farm & nonfarm)	18,679	16,159	3,410	39,460
<b>Cash Provided By Operating Activities</b>				
Gross cash farm income	897,727	319,414	770,054	1,762,662
Total cash farm expense	-718,942	-278,292	-611,665	-1,427,826
Net cash from hedging transactions	1,027	-4,490	-2,732	11,663
Cash provided by operating	179,812	36,632	155,657	346,499
<b>Cash Provided By Investing Activities</b>				
Sale of breeding livestock	57	-	40	-
Sale of machinery & equipment	8,681	2,589	5,763	26,657
Sale of titled vehicles	620	815	135	1,423
Sale of farm land	4,545	109	336	6,458
Sale of farm buildings	100	213	-	-
Sale of other farm assets	8,992	5,761	416	18,009
Sale of nonfarm assets	8,291	2,730	6,164	22,985
Purchase of breeding livestock	-209	-277	-213	-
Purchase of machinery & equip.	-112,287	-39,240	-103,741	-207,962
Purchase of titled vehicles	-7,566	-6,146	-5,717	-16,560
Purchase of farm land	-51,354	-25,777	-36,639	-63,615
Purchase of farm buildings	-21,369	-3,838	-12,431	-53,380
Purchase of other farm assets	-9,965	-4,371	-1,290	-24,945
Purchase of nonfarm assets	-25,587	-13,753	-29,163	-37,304
Cash provided by investing	-197,051	-81,187	-176,338	-328,233
<b>Cash Provided By Financing Activities</b>				
Money borrowed	502,773	233,142	460,885	869,153
Principal payments	-405,920	-149,893	-396,031	-719,233
Personal income	17,926	26,267	19,177	11,280
Family living/owner withdrawals	-65,323	-47,767	-59,074	-91,733
Income and social security tax	-15,859	-7,900	-15,726	-20,815
Capital contributions	84	-	-	417
Capital distributions	-279	-	-1,388	-
Dividends paid	-	-	-	-
Cash gifts and inheritances	4,981	490	18,326	1,001
Gifts given	-498	-	-419	-126
Cash provided by financing	37,886	54,339	25,750	49,943
Net change in cash balance	20,647	9,784	5,069	68,209
Ending cash (farm & nonfarm)	39,326	25,943	8,480	107,668

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**Financial Standards Measures**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

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	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Liquidity</b>				
Current ratio	1.89	1.40	1.68	2.19
Working capital	373,946	64,255	219,469	967,154
Working capital to gross inc	36.9 %	19.2 %	25.5 %	46.7 %
<b>Solvency (market)</b>				
Farm debt to asset ratio	45 %	57 %	45 %	42 %
Farm equity to asset ratio	55 %	43 %	55 %	58 %
Farm debt to equity ratio	0.83	1.30	0.80	0.72
<b>Profitability (cost)</b>				
Rate of return on farm assets	14.6 %	4.6 %	13.0 %	18.0 %
Rate of return on farm equity	20.6 %	3.2 %	18.9 %	25.0 %
Operating profit margin	24.7 %	8.3 %	22.5 %	29.9 %
Net farm income	277,690	38,569	212,441	670,267
EBIDTA	360,439	70,181	290,750	823,115
<b>Repayment Capacity</b>				
Capital debt repayment capacity	279,772	27,269	219,898	699,388
Capital debt repayment margin	207,103	-4,939	146,470	562,401
Replacement margin	192,966	-7,629	132,715	537,766
Term debt coverage ratio	3.85	0.85	2.99	5.11
Replacement coverage ratio	3.22	0.78	2.52	4.33
<b>Efficiency</b>				
Asset turnover rate (cost)	59.0 %	55.2 %	57.7 %	60.1 %
Operating expense ratio	64.4 %	79.0 %	66.2 %	60.3 %
Depreciation expense ratio	4.6 %	4.4 %	4.9 %	4.3 %
Interest expense ratio	3.7 %	4.9 %	4.3 %	3.3 %
Net farm income ratio	27.4 %	11.5 %	24.7 %	32.4 %

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**Crop Production and Marketing Summary**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Acreage Summary</b>				
Total acres owned	402	161	412	671
Total crop acres	1,832	741	1,638	3,512
Crop acres owned	366	157	348	672
Crop acres cash rented	1,397	525	1,235	2,736
Crop acres share rented	70	59	55	104
Total pasture acres	4	5	-	-
Percent crop acres owned	20 %	21 %	21 %	19 %
<b>Average Price Received (Cash Sales Only)</b>				
Soybeans per bushel	9.99	9.11	10.31	9.84
Wheat, Spring per bushel	7.47	6.75	7.62	7.63
Corn per bushel	4.41	4.55	4.18	4.32
Sunflowers per cwt	22.97	-	-	23.51
Sugar Beets per ton	46.79	47.44	-	-
Beans, Navy per cwt	26.74	-	-	-
Barley per bushel	3.74	-	-	-
Sunflowers, Confectionary per cwt	23.98	-	-	-
Beans, Black Turtle per cwt	27.54	-	-	-
Beans, Pinto per cwt	29.18	-	-	-
Straw per ton	33.01	-	-	-
Hay, Alfalfa per ton	99.05	-	-	-
Soybeans, Organic per bushel	23.59	-	-	-
Soybeans, Food per bushel	12.39	-	-	-
<b>Average Yield Per Acre</b>				
Soybeans (bushel)	32.48	31.70	31.40	33.67
Wheat, Spring (bushel)	63.54	57.49	59.06	67.67
Sugar Beets (ton)	20.48	18.30	17.61	22.26
Corn (bushel)	154.42	146.92	154.04	156.60
Beans, Pinto (cwt)	20.66	-	-	21.15
Beans, Navy (cwt)	18.15	-	-	18.58
Sunflowers (cwt)	17.04	-	-	-
Barley (bushel)	89.29	-	-	-
Soybeans, Food (bushel)	26.55	-	28.28	-
Hay, Alfalfa (ton)	3.75	-	-	-
Beans, Black Turtle (cwt)	15.03	-	-	-
Wheat, Winter (bushel)	66.04	-	-	-

**Operator and Labor Information**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Operator Information</b>				
Average number of operators	1.1	1.0	1.1	1.5
Average age of operators	44.3	40.8	44.9	46.7
Average number of years farming	21.4	16.4	21.4	24.8
<b>Results Per Operator</b>				
Working capital	328,534	66,888	206,559	644,769
Total assets (market)	2,107,561	952,152	2,069,611	3,109,631
Total liabilities	926,563	529,678	928,575	1,334,740
Net worth (market)	1,180,998	422,474	1,141,037	1,774,891
Net worth excl deferred liabs	1,410,170	495,487	1,353,379	2,191,162
Gross farm income	889,418	348,408	809,477	1,381,071
Total farm expense	646,351	310,716	609,702	934,226
Net farm income from operations	243,068	37,691	199,774	446,844
Net nonfarm income	15,731	27,343	18,049	7,520
Family living & tax withdrawals	71,240	57,948	70,401	75,032
Total acres owned	352.8	167.2	387.9	447.3
Total crop acres	1,607.7	771.1	1,541.3	2,341.2
Crop acres owned	320.9	163.0	328.0	448.2
Crop acres cash rented	1,225.8	546.2	1,162.0	1,823.8
Crop acres share rented	61.0	61.8	51.4	69.1
Total pasture acres	3.4	5.5	-	-
<b>Labor Analysis</b>				
Number of farms	238	47	48	48
Total unpaid labor hours	1,930	1,596	1,781	2,561
Total hired labor hours	1,649	332	1,252	3,882
Total labor hours per farm	3,579	1,928	3,033	6,444
Unpaid hours per operator	1,693	1,661	1,676	1,708



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**Nonfarm Summary**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Farm Income)**

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	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	239	47	48	48
<b>Nonfarm Income</b>				
Personal wages & salary	12,361	19,945	15,747	2,647
Net nonfarm business income	2,393	3,068	814	4,742
Personal rental income	306	67	473	784
Personal interest income	567	413	840	791
Personal cash dividends	11	1	-	6
Tax refunds	569	903	436	416
Capital contributions	84	-	-	417
Other nonfarm income	1,720	1,870	866	1,894
Total nonfarm income	18,010	26,267	19,177	11,697
Gifts and inheritances	4,981	490	18,326	1,001

**Financial Summary**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Gross Farm Income)**

	<u>Avg. Of All Farms</u>	<u>50,001 - 100,000</u>	<u>100,001 - 250,000</u>	<u>250,001 - 500,000</u>	<u>500,001 - 1,000,000</u>	<u>Over 1,000,000</u>
Number of farms	239	5	23	42	90	77
<b>Income Statement</b>						
Gross cash farm income	897,727	70,780	180,326	374,685	741,031	1,656,613
Total cash farm expense	718,942	71,293	147,814	301,658	585,520	1,332,758
Net cash farm income	178,784	-513	32,511	73,027	155,511	323,854
Inventory change	144,392	23,974	24,554	65,577	108,886	275,218
Depreciation and capital adjust	-46,191	-4,095	-7,336	-20,260	-42,455	-80,160
Average net farm income from opr	276,986	19,365	49,729	118,344	221,942	518,913
Median net farm income from opr.	212,762	18,657	44,977	116,803	217,253	492,118
<b>Profitability (cost)</b>						
Rate of return on assets	14.6 %	7.8 %	11.1 %	12.5 %	13.6 %	15.6 %
Rate of return on equity	20.6 %	9.9 %	19.8 %	18.0 %	19.4 %	21.7 %
Operating profit margin	24.7 %	17.6 %	19.3 %	22.8 %	24.3 %	25.4 %
Asset turnover rate	59.0 %	44.3 %	57.7 %	54.8 %	56.0 %	61.5 %
<b>Liquidity &amp; Repayment (end of year)</b>						
Current assets	503,618	65,730	108,182	296,217	566,571	701,117
Current liabilities	266,637	56,661	73,612	154,406	298,675	367,782
Current ratio	1.89	1.16	1.47	1.92	1.90	1.91
Working capital	236,981	9,069	34,569	141,810	267,896	333,335
Working capital to gross inc	23.4 %	8.8 %	17.1 %	31.6 %	31.8 %	18.1 %
Term debt coverage ratio	3.85	1.62	2.09	3.23	3.35	4.37
Replacement coverage ratio	3.22	1.11	1.99	2.47	2.81	3.69
<b>Solvency (end of year at market)</b>						
Number of sole proprietors	206	5	23	42	87	47
Total farm assets	1,902,634	319,046	472,856	1,121,054	1,982,049	3,394,681
Total farm liabilities	681,055	142,820	221,001	396,162	701,796	1,203,687
Total assets	2,132,613	387,730	566,463	1,261,895	2,225,148	3,766,531
Total liabilities	945,474	182,869	291,544	544,772	976,954	1,676,904
Net worth	1,187,139	204,861	274,919	717,123	1,248,194	2,089,627
Net worth change	200,646	16,051	45,887	109,256	160,352	458,646
Farm debt to asset ratio	36 %	45 %	47 %	35 %	35 %	35 %
Total debt to asset ratio	44 %	47 %	51 %	43 %	44 %	45 %
<b>Nonfarm Information</b>						
Net nonfarm income	17,926	40,613	29,597	19,952	17,700	11,729
<b>Crop Acres</b>						
Total acres owned	402	115	96	324	426	536
Total crop acres	1,832	281	415	984	1,604	3,129
Total crop acres owned	366	129	80	286	383	498
Total crop acres cash rented	1,397	152	286	628	1,177	2,519
Total crop acres share rented	70	-	50	70	44	112

**Financial Summary**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Age Of Operator)**

	<u>Avg. Of All Farms</u>	<u>Less Than 31</u>	<u>31 - 40</u>	<u>41 - 50</u>	<u>51 - 60</u>	<u>Over 60</u>
Number of farms	239	30	56	76	66	11
<b>Income Statement</b>						
Gross cash farm income	897,727	394,446	924,307	1,041,229	955,325	797,936
Total cash farm expense	718,942	350,696	773,499	825,622	739,420	585,584
Net cash farm income	178,784	43,751	150,807	215,607	215,905	212,352
Inventory change	144,392	84,605	167,218	158,099	144,047	98,617
Depreciation and capital adjust	-46,191	-15,961	-41,758	-56,327	-52,956	-40,583
Average net farm income from opr	276,986	112,394	276,267	317,379	306,996	270,387
Median net farm income from opr.	212,762	71,602	193,206	269,514	219,959	135,177
<b>Profitability (cost)</b>						
Rate of return on assets	14.6 %	16.2 %	15.9 %	15.1 %	13.0 %	15.3 %
Rate of return on equity	20.6 %	33.9 %	24.5 %	21.7 %	16.8 %	19.2 %
Operating profit margin	24.7 %	21.7 %	23.2 %	25.3 %	25.6 %	26.6 %
Asset turnover rate	59.0 %	74.4 %	68.5 %	59.8 %	50.6 %	57.5 %
<b>Liquidity &amp; Repayment (end of year)</b>						
Current assets	503,618	223,460	502,611	559,371	606,452	270,611
Current liabilities	266,637	156,575	277,685	300,096	283,134	180,414
Current ratio	1.89	1.43	1.81	1.86	2.14	1.50
Working capital	236,981	66,885	224,926	259,275	323,319	90,197
Working capital to gross inc	23.4 %	14.6 %	21.3 %	22.5 %	29.6 %	10.2 %
Term debt coverage ratio	3.85	3.23	3.79	3.86	3.81	5.68
Replacement coverage ratio	3.22	3.14	3.42	3.22	3.04	3.86
<b>Solvency (end of year at market)</b>						
Number of sole proprietors	206	29	48	61	59	9
Total farm assets	1,902,634	696,123	1,657,086	2,151,228	2,559,175	1,110,952
Total farm liabilities	681,055	408,412	663,148	786,108	753,702	466,816
Total assets	2,132,613	767,824	1,792,531	2,462,501	2,866,479	1,297,236
Total liabilities	945,474	503,263	920,435	1,109,608	1,058,514	650,425
Net worth	1,187,139	264,561	872,096	1,352,893	1,807,966	646,811
Net worth change	200,646	79,229	154,366	226,382	293,384	56,322
Farm debt to asset ratio	36 %	59 %	40 %	37 %	29 %	42 %
Total debt to asset ratio	44 %	66 %	51 %	45 %	37 %	50 %
<b>Nonfarm Information</b>						
Net nonfarm income	17,926	18,171	13,282	19,772	19,836	16,691
<b>Crop Acres</b>						
Total acres owned	402	136	288	382	622	521
Total crop acres	1,832	821	1,921	2,118	1,911	1,686
Total crop acres owned	366	131	274	371	525	478
Total crop acres cash rented	1,397	653	1,612	1,672	1,289	1,081
Total crop acres share rented	70	38	35	75	97	127

**Financial Summary**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By County)**

	<b>Avg. Of All Farms</b>	<b>Clay</b>	<b>Marshall</b>	<b>Norman</b>	<b>Polk</b>	<b>Wilkin</b>	<b>Cass</b>	<b>Grand Fork</b>	<b>Richland</b>
Number of farms	239	44	12	33	38	44	17	5	32
<b>Income Statement</b>									
Gross cash farm income	897,727	1,022,602	866,652	1,017,539	1,107,705	655,714	835,600	533,876	811,072
Total cash farm expense	718,942	791,866	699,964	875,471	907,363	503,937	618,850	415,654	646,931
Net cash farm income	178,784	230,736	166,688	142,068	200,342	151,777	216,750	118,222	164,141
Inventory change	144,392	127,452	112,400	167,645	224,900	71,013	96,618	62,321	177,061
Depreciation and capital adjust	-46,191	-47,771	-64,057	-45,717	-52,983	-35,009	-45,672	-22,316	-49,484
Average net farm income from opr	276,986	310,417	215,030	263,996	372,259	187,781	267,696	158,226	291,718
Median net farm income from opr.	212,762	200,836	143,917	256,443	303,401	178,199	188,193	131,646	239,064
<b>Profitability (cost)</b>									
Rate of return on assets	14.6 %	13.9 %	12.2 %	13.1 %	15.9 %	12.6 %	18.4 %	18.6 %	15.2 %
Rate of return on equity	20.6 %	18.7 %	16.1 %	19.9 %	22.1 %	18.4 %	26.5 %	31.1 %	20.1 %
Operating profit margin	24.7 %	25.8 %	20.2 %	21.2 %	25.5 %	23.3 %	27.2 %	23.9 %	27.0 %
Asset turnover rate	59.0 %	53.9 %	60.4 %	62.0 %	62.1 %	54.3 %	67.8 %	77.6 %	56.1 %
<b>Liquidity &amp; Repayment (end of year)</b>									
Current assets	503,618	593,930	448,974	702,466	322,538	401,430	597,045	296,270	547,588
Current liabilities	266,637	376,772	173,772	403,858	184,570	217,012	251,590	149,572	207,393
Current ratio	1.89	1.58	2.58	1.74	1.75	1.85	2.37	1.98	2.64
Working capital	236,981	217,158	275,202	298,608	137,968	184,418	345,455	146,698	340,195
Working capital to gross inc	23.4 %	19.3 %	28.4 %	26.1 %	11.0 %	25.9 %	36.8 %	24.8 %	34.7 %
Term debt coverage ratio	3.85	3.04	4.03	3.30	4.83	2.90	5.47	11.01	4.55
Replacement coverage ratio	3.22	2.60	2.88	2.87	4.23	2.50	4.36	6.61	3.49
<b>Solvency (end of year at market)</b>									
Number of sole proprietors	206	39	9	31	24	43	16	5	28
Total farm assets	1,902,634	2,570,567	1,744,002	2,214,379	1,345,203	1,607,701	1,745,269	977,098	1,924,775
Total farm liabilities	681,055	823,528	596,082	842,276	593,431	599,440	593,174	429,630	572,423
Total assets	2,132,613	2,937,106	1,945,357	2,459,156	1,539,516	1,788,985	1,922,814	1,078,187	2,103,948
Total liabilities	945,474	1,260,245	889,022	1,148,262	846,257	782,436	814,258	527,111	770,393
Net worth	1,187,139	1,676,862	1,056,335	1,310,893	693,259	1,006,549	1,108,556	551,076	1,333,555
Net worth change	200,646	147,784	148,914	170,530	101,641	215,543	183,164	158,882	372,635
Farm debt to asset ratio	36 %	32 %	34 %	38 %	44 %	37 %	34 %	44 %	30 %
Total debt to asset ratio	44 %	43 %	46 %	47 %	55 %	44 %	42 %	49 %	37 %
<b>Nonfarm Information</b>									
Net nonfarm income	17,926	13,965	18,175	16,083	11,507	25,418	19,583	54,603	16,055
<b>Crop Acres</b>									
Total acres owned	402	452	618	461	352	338	298	162	421
Total crop acres	1,832	2,000	1,803	2,214	2,089	1,244	1,826	1,307	1,747
Total crop acres owned	366	394	560	411	393	306	236	136	374
Total crop acres cash rented	1,397	1,567	1,236	1,780	1,657	829	1,547	1,119	1,201
Total crop acres share rented	70	39	7	23	39	110	43	52	172

## EXPLANATORY NOTES FOR CROPS TABLES

The "Crop Enterprise Analysis" tables show the average physical production, gross return, direct costs, overhead costs, and net returns per acre. The "Net Return per Acre" is the "Gross Return per Acre" minus the direct and overhead costs. "Net Return" represents the return to the operator's and family's unpaid labor, management, and equity. It represents the return to all of the resources which are owned by the farm family and hence, not purchased or paid a wage. Net returns are also calculated after a charge for unpaid operator labor and management and after an allocation of direct government payments. The last section of each crop table contains breakeven yield measures which provide useful standards or goals for the individual managers.

There are potentially three tables for each crop depending on the farmer's tenure on the land. The crop tables may be for (1) owned land, (2) cash rented land, and (3) share rented land. Individual farms may have data in all three tables if all three land tenure categories are represented in that farm business. When there are less than five farms with a particular crop and tenure, that table is not included in the report. Farms may be classified into the low 20%, the mid 20%, or the high 20% on the basis of net return per acre. The classification is done separately for each table, i.e., an individual farm may be in the low 20% for one crop, the high 20% for a second, and the middle 20% for a third. When there are less than 25 total farms with any particular crop and farmer's tenure, only overall averages are presented.

Value per unit is the market price received plus any loan deficiency payment. Miscellaneous income includes crop insurance and disaster payments for the crop.

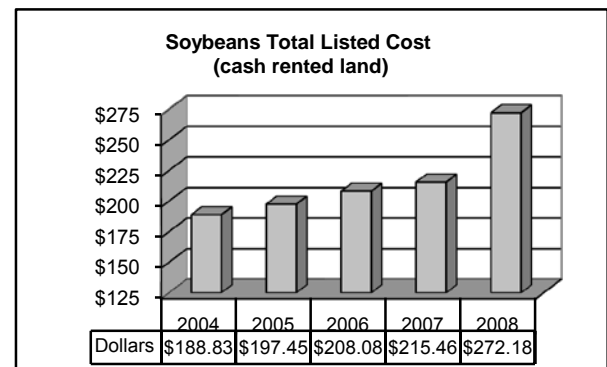
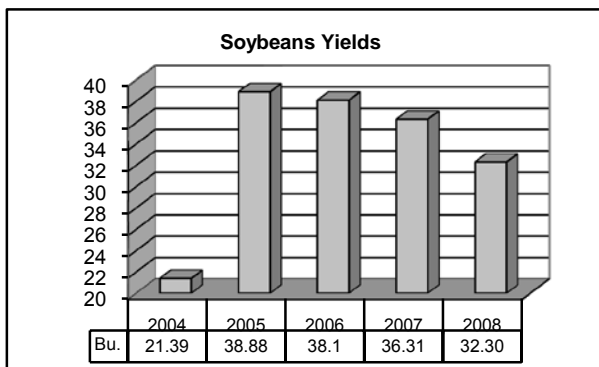
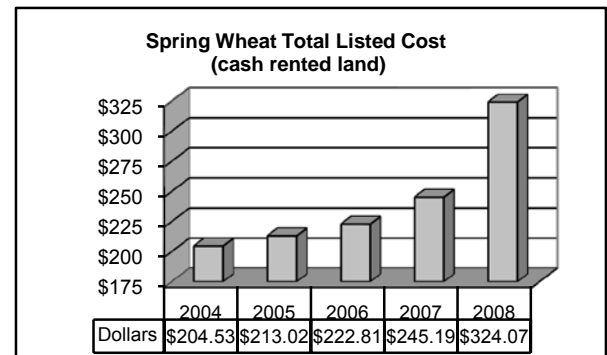
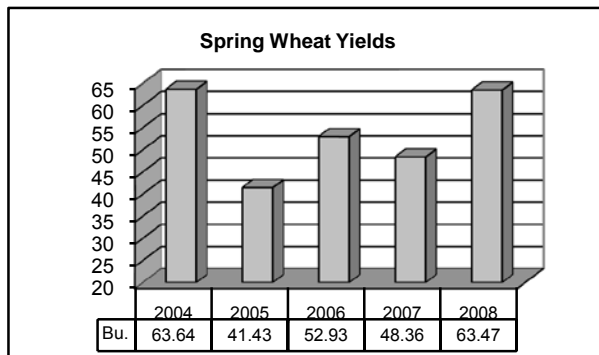
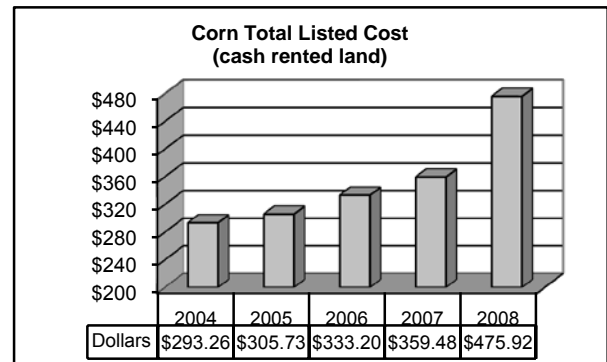
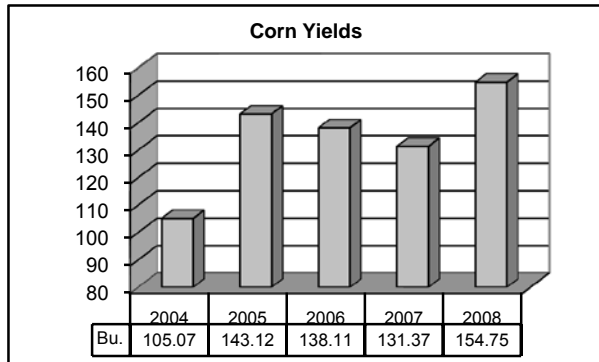
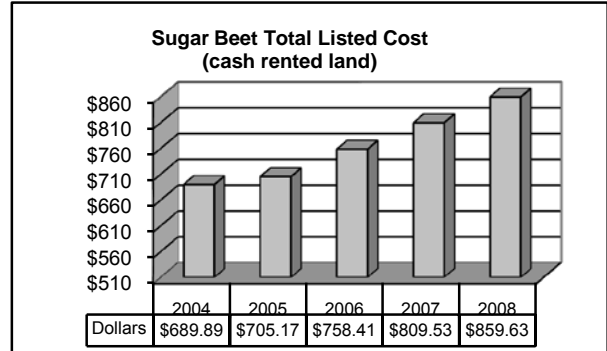
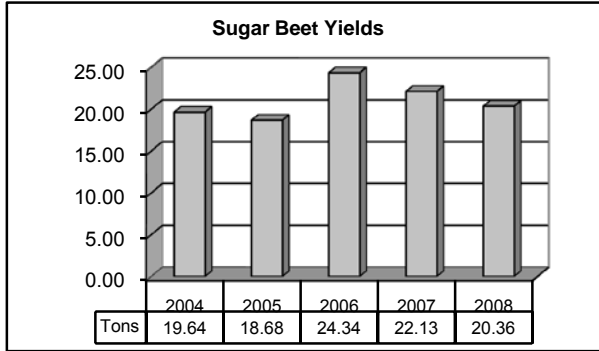
Several cost items, such as "utilities," "hired labor," and "interest paid," are listed under both "direct" and "overhead" costs because some of these costs are specific to that crop whereas others are general overhead costs of the farm. For example, "Direct Lease Payments" refers to non-land inputs or resources leased and used only in that crop enterprise and not listed elsewhere under direct costs; the most common example is the lease of equipment that is crop specific. However, cost of leasing machinery that is used for the entire farm operation is listed as an overhead cost. Interest payments are likewise divided into those incurred directly for a specific crop and those that are not. "Land Rent" is listed as a separate category and is assigned as a direct cost for each crop enterprise because it is identifiable with the specific crop. In the case of double cropping, one-half of the rent is charged to each crop.

"Total direct expense per unit" and "Total dir & ovhd exp per unit" are calculated by dividing "Total direct expense per acre" and "Total dir & ovhd expenses per acre," respectively, by "Yield per acre." "With labor & management" is the breakeven yield after direct, overhead and a labor and management charge are considered. "Total exp less govt & oth income" is the breakeven yield after all costs (including a labor and management charge) are reduced by government payments and miscellaneous income.

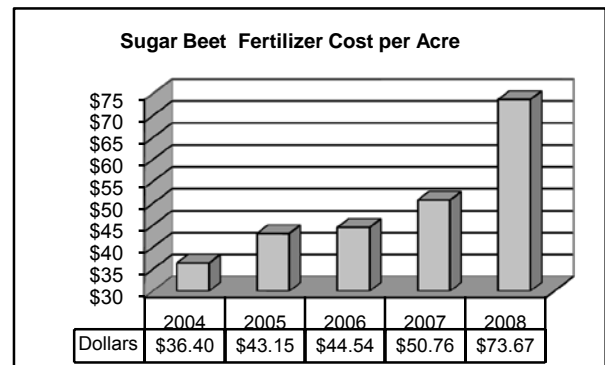
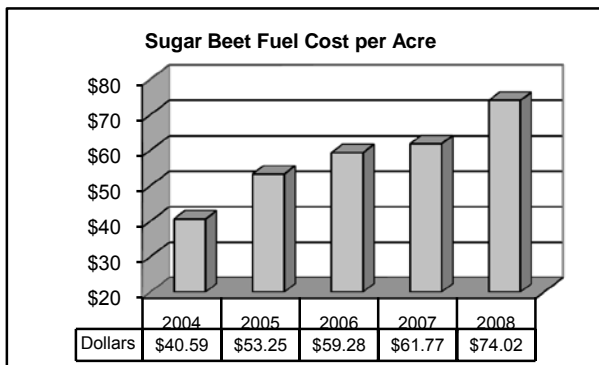
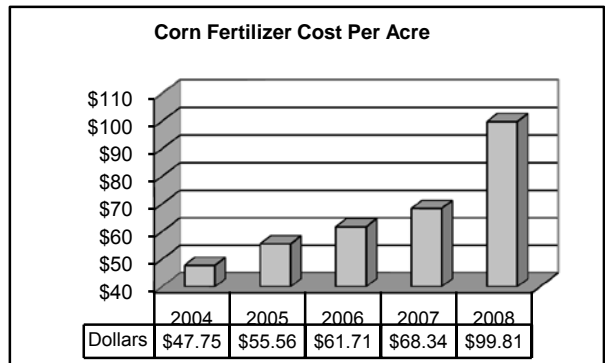
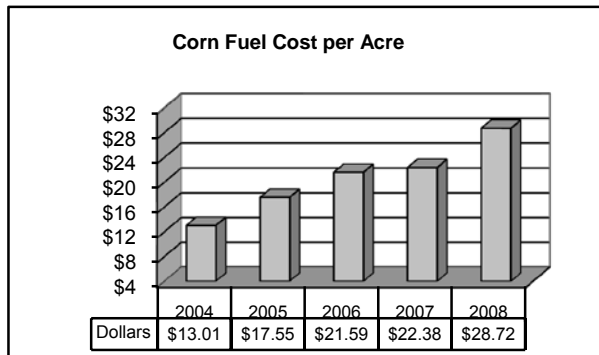
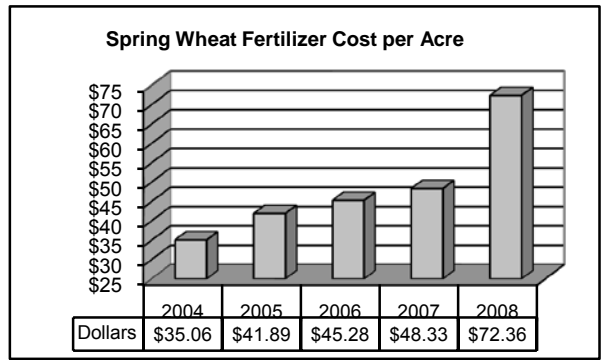
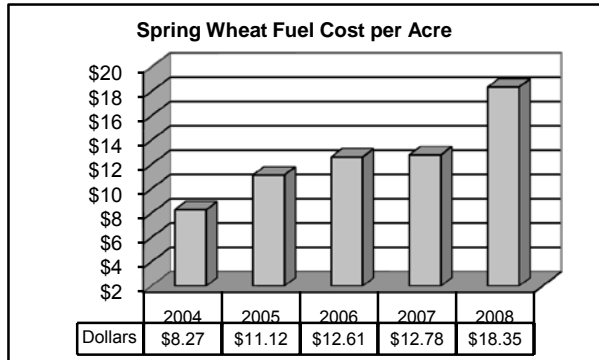
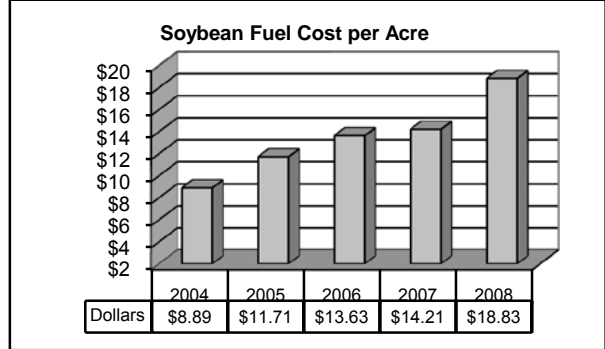
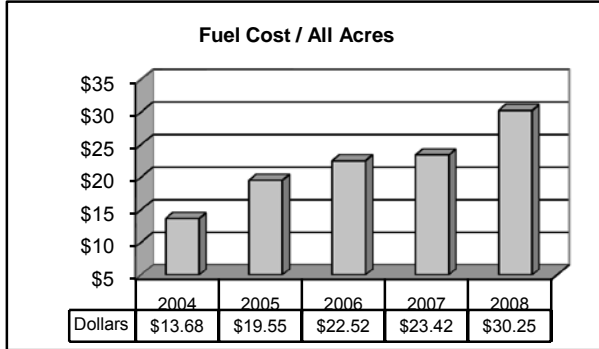
In the last section of the crop table, "machinery cost per acre" is the sum of fuel, repairs, all custom hire and machinery leases, machinery depreciation and interest on intermediate debt.

Rounding of individual items for the report may have caused minor discrepancies with the calculated totals.

## Five Year Crop History of Yields and Cost of Production Red River Valley Farm Business Management Education



## Five Year Crop History of Fuel and Fertilizer Costs per Acre Red River Valley Farm Business Management Education



**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Return)**

**Barley on Cash Rent**

	<b>Avg. Of All Farms</b>
Number of fields	8
Number of farms	8
Acres	236.10
Yield per acre (bu.)	94.18
Operators share of yield %	100.00
Value per bu.	5.66
Total product return per acre	532.70
Gross return per acre	532.70
<b>Direct Expenses</b>	
Seed	19.52
Fertilizer	84.13
Crop chemicals	27.66
Crop insurance	18.73
Fuel & oil	21.68
Repairs	17.82
Custom hire	2.18
Land rent	70.38
Operating interest	5.90
Total direct expenses per acre	268.01
Return over direct exp per acre	264.69
<b>Overhead Expenses</b>	
Custom hire	6.13
Hired labor	10.40
Machinery leases	7.49
Building leases	0.52
Farm insurance	4.20
Utilities	2.20
Dues & professional fees	2.54
Interest	6.83
Mach & bldg depreciation	16.07
Miscellaneous	3.61
Total overhead expenses per acre	59.99
Total dir & ovhd expenses per acre	328.00
Net return per acre	204.70
Government payments	15.88
Net return with govt pmts	220.58
Labor & management charge	23.12
Net return over lbr & mgt	197.46
<b>Cost of Production</b>	
Total direct expense per bu.	2.85
Total dir & ovhd exp per bu.	3.48
Less govt & other income	3.31
With labor & management	3.56
Net value per unit	5.66
Machinery cost per acre	77.58
Est. labor hours per acre	1.34



**Crop Enterprise Analysis**  
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**(Farms Sorted By Net Return)**

**Beans, Black Turtle on Cash Rent**

	<b>Avg. Of All Farms</b>
Number of fields	10
Number of farms	7
Acres	121.60
Yield per acre (cwt.)	14.70
Operators share of yield %	100.00
Value per cwt.	33.89
Total product return per acre	498.08
Crop insurance per acre	11.50
Gross return per acre	509.58
<b>Direct Expenses</b>	
Seed	37.19
Fertilizer	46.32
Crop chemicals	47.34
Crop insurance	25.04
Drying expense	1.73
Fuel & oil	31.84
Repairs	25.54
Custom hire	0.70
Hired labor	0.67
Land rent	77.30
Operating interest	6.62
Miscellaneous	0.29
Total direct expenses per acre	300.57
Return over direct exp per acre	209.01
<b>Overhead Expenses</b>	
Custom hire	2.77
Hired labor	14.21
Machinery leases	3.35
Building leases	0.22
Farm insurance	4.09
Utilities	2.59
Dues & professional fees	2.15
Interest	4.86
Mach & bldg depreciation	24.58
Miscellaneous	6.87
Total overhead expenses per acre	65.70
Total dir & ovhd expenses per acre	366.28
Net return per acre	143.31
Government payments	-
Net return with govt pmts	143.31
Labor & management charge	34.92
Net return over lbr & mgt	108.39
<b>Cost of Production</b>	
Total direct expense per cwt.	20.45
Total dir & ovhd exp per cwt.	24.92
Less govt & other income	24.14
With labor & management	26.51
Net value per unit	33.89
Machinery cost per acre	91.69
Est. labor hours per acre	2.03

**Crop Enterprise Analysis**  
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**Beans, Navy on Cash Rent**

	<u>Avg. Of All Farms</u>
Number of fields	13
Number of farms	8
Acres	154.16
Yield per acre (cwt.)	19.11
Operators share of yield %	100.00
Value per cwt.	30.35
Total product return per acre	580.10
Crop insurance per acre	0.40
Gross return per acre	580.50
<b>Direct Expenses</b>	
Seed	47.72
Fertilizer	32.63
Crop chemicals	35.71
Crop insurance	26.62
Fuel & oil	28.68
Repairs	36.17
Custom hire	3.94
Hired labor	0.91
Land rent	72.64
Machinery leases	2.07
Operating interest	5.41
Miscellaneous	0.39
Total direct expenses per acre	292.90
Return over direct exp per acre	287.60
<b>Overhead Expenses</b>	
Custom hire	3.19
Hired labor	17.36
Machinery leases	8.82
Building leases	0.17
Farm insurance	6.03
Utilities	3.66
Dues & professional fees	3.88
Interest	6.80
Mach & bldg depreciation	29.99
Miscellaneous	3.64
Total overhead expenses per acre	83.54
Total dir & ovhd expenses per acre	376.44
Net return per acre	204.06
Government payments	-
Net return with govt pmts	204.06
Labor & management charge	37.51
Net return over lbr & mgt	166.55
<b>Cost of Production</b>	
Total direct expense per cwt.	15.32
Total dir & ovhd exp per cwt.	19.70
Less govt & other income	19.67
With labor & management	21.64
Net value per unit	30.35
Machinery cost per acre	118.55
Est. labor hours per acre	2.39

**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
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**Beans, Pinto on Cash Rent**

	<u>Avg. Of All Farms</u>
Number of fields	12
Number of farms	5
Acres	115.32
Yield per acre (cwt.)	21.12
Operators share of yield %	100.00
Value per cwt.	26.97
Total product return per acre	569.53
Crop insurance per acre	0.31
Gross return per acre	569.85
<b>Direct Expenses</b>	
Seed	48.50
Fertilizer	28.01
Crop chemicals	48.68
Crop insurance	24.64
Fuel & oil	23.97
Repairs	25.41
Custom hire	4.69
Land rent	73.17
Operating interest	6.02
Total direct expenses per acre	283.10
Return over direct exp per acre	286.75
<b>Overhead Expenses</b>	
Custom hire	1.51
Hired labor	15.56
Machinery leases	2.38
Building leases	5.86
Farm insurance	3.10
Utilities	2.56
Dues & professional fees	3.39
Interest	4.00
Mach & bldg depreciation	25.57
Miscellaneous	1.50
Total overhead expenses per acre	65.43
Total dir & ovhd expenses per acre	348.53
Net return per acre	221.32
Government payments	-
Net return with govt pmts	221.32
Labor & management charge	32.46
Net return over lbr & mgt	188.86
<b>Cost of Production</b>	
Total direct expense per cwt.	13.40
Total dir & ovhd exp per cwt.	16.50
Less govt & other income	16.49
With labor & management	18.02
Net value per unit	26.97
Machinery cost per acre	86.57
Est. labor hours per acre	2.14

**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Return)**

**Corn on Owned Land**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	87	16	17	22
Number of farms	77	15	16	16
Acres	168.22	159.02	126.94	159.40
Yield per acre (bu.)	153.21	132.68	157.92	170.03
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	3.89	3.53	3.74	4.11
Total product return per acre	595.86	468.74	590.82	699.07
Hedging gains/losses per acre	0.72	-	4.88	-
Crop insurance per acre	6.68	0.26	-	13.23
Other crop income per acre	0.73	-	-	-
Gross return per acre	604.00	469.00	595.70	712.30
<b>Direct Expenses</b>				
Seed	63.00	58.44	60.03	63.64
Fertilizer	103.71	96.26	98.22	103.36
Crop chemicals	20.86	18.50	20.92	20.35
Crop insurance	33.88	38.16	29.88	33.41
Drying expense	39.34	36.25	45.37	33.82
Storage	0.16	0.93	-	-
Fuel & oil	25.23	30.85	27.28	20.41
Repairs	27.68	34.72	26.42	23.13
Custom hire	3.04	3.56	7.46	0.89
Hired labor	0.72	0.04	2.96	0.31
Operating interest	8.26	9.14	10.26	11.03
Miscellaneous	0.47	0.07	0.01	0.07
Total direct expenses per acre	326.34	326.92	328.82	310.42
Return over direct exp per acre	277.66	142.08	266.88	401.88
<b>Overhead Expenses</b>				
Custom hire	0.98	0.80	2.90	0.40
Hired labor	11.58	11.80	6.69	9.03
Machinery leases	2.33	0.94	2.05	4.34
Building leases	1.64	7.96	0.41	-
RE & pers. property taxes	12.60	10.07	12.27	12.21
Farm insurance	4.63	4.66	3.76	5.51
Utilities	3.57	3.44	3.11	4.30
Dues & professional fees	3.04	3.64	2.14	2.82
Interest	40.49	47.67	56.20	38.77
Mach & bldg depreciation	27.34	26.83	21.10	27.53
Miscellaneous	3.59	4.37	4.52	3.36
Total overhead expenses per acre	111.79	122.18	115.15	108.27
Total dir & ovhd expenses per acre	438.13	449.10	443.96	418.70
Net return per acre	165.87	19.90	151.74	293.60
Government payments	14.29	14.60	13.99	14.89
Net return with govt pmts	180.15	34.51	165.72	308.49
Labor & management charge	31.87	35.87	30.99	32.76
Net return over lbr & mgt	148.28	-1.36	134.74	275.74
<b>Cost of Production</b>				
Total direct expense per bu.	2.13	2.46	2.08	1.83
Total dir & ovhd exp per bu.	2.86	3.38	2.81	2.46
Less govt & other income	2.71	3.27	2.69	2.30
With labor & management	2.92	3.54	2.89	2.49
Net value per unit	3.89	3.53	3.77	4.11
Machinery cost per acre	92.41	103.40	94.77	82.92
Est. labor hours per acre	1.70	2.02	1.67	1.53

**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
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**(Farms Sorted By Net Return)**

**Corn on Cash Rent**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	150	25	40	28
Number of farms	109	21	22	22
Acres	363.81	242.29	284.74	361.66
Yield per acre (bu.)	154.75	142.43	156.57	170.34
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	3.86	3.66	3.62	4.33
Total product return per acre	597.25	521.31	566.12	737.72
Hedging gains/losses per acre	1.82	-	9.73	-1.13
Crop insurance per acre	7.86	3.34	16.65	2.85
Other crop income per acre	1.48	0.28	1.17	2.57
Gross return per acre	608.40	524.93	593.67	742.00
<b>Direct Expenses</b>				
Seed	62.37	68.55	56.99	62.59
Fertilizer	99.81	103.19	97.83	97.57
Crop chemicals	22.13	26.65	20.08	18.58
Crop insurance	30.69	35.65	30.73	30.30
Drying expense	42.76	53.70	43.18	39.51
Storage	0.23	0.37	0.93	-
Fuel & oil	28.72	30.72	28.81	32.03
Repairs	30.11	37.68	33.55	31.87
Custom hire	3.80	4.00	5.06	2.79
Hired labor	1.25	2.32	1.47	0.45
Land rent	77.18	76.16	74.74	77.59
Utilities	0.23	-	0.57	0.29
Operating interest	7.45	6.70	10.19	6.99
Miscellaneous	0.48	0.44	0.16	0.23
Total direct expenses per acre	407.20	446.12	404.30	400.79
Return over direct exp per acre	201.21	78.82	189.37	341.21
<b>Overhead Expenses</b>				
Custom hire	2.01	0.92	4.77	0.89
Hired labor	12.94	8.56	10.96	15.97
Machinery leases	4.47	4.22	3.81	3.88
Building leases	0.72	1.87	1.77	0.03
Farm insurance	4.47	4.09	4.86	5.03
Utilities	3.32	4.23	3.94	3.68
Dues & professional fees	3.12	5.29	2.78	2.70
Interest	6.79	5.39	5.23	8.36
Mach & bldg depreciation	27.38	30.74	29.20	26.85
Miscellaneous	3.49	4.80	3.42	3.14
Total overhead expenses per acre	68.72	70.10	70.75	70.53
Total dir & ovhd expenses per acre	475.92	516.22	475.04	471.32
Net return per acre	132.49	8.71	118.62	270.68
Government payments	13.98	14.79	13.58	15.01
Net return with govt pmnts	146.47	23.50	132.20	285.69
Labor & management charge	33.58	40.64	37.80	34.55
Net return over lbr & mgt	112.89	-17.14	94.40	251.14
<b>Cost of Production</b>				
Total direct expense per bu.	2.63	3.13	2.58	2.35
Total dir & ovhd exp per bu.	3.08	3.62	3.03	2.77
Less govt & other income	2.91	3.50	2.77	2.65
With labor & management	3.13	3.78	3.01	2.86
Net value per unit	3.87	3.66	3.68	4.32
Machinery cost per acre	101.14	111.71	105.96	104.60
Est. labor hours per acre	1.78	1.94	2.13	1.77

**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
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**(Farms Sorted By Net Return)**

**Corn on Share Rent**

	<b>Avg. Of All Farms</b>
Number of fields	18
Number of farms	14
Acres	111.87
Yield per acre (bu.)	154.54
Operators share of yield %	68.39
Value per bu.	4.09
Total product return per acre	432.32
Hedging gains/losses per acre	-0.34
Crop insurance per acre	12.42
Other crop income per acre	6.24
Gross return per acre	450.64
<b>Direct Expenses</b>	
Seed	59.15
Fertilizer	104.56
Crop chemicals	15.55
Crop insurance	22.55
Drying expense	40.09
Fuel & oil	29.89
Repairs	27.49
Custom hire	1.95
Hired labor	1.38
Operating interest	4.81
Miscellaneous	0.06
Total direct expenses per acre	307.48
Return over direct exp per acre	143.16
<b>Overhead Expenses</b>	
Hired labor	17.22
Machinery leases	1.67
Building leases	0.18
Farm insurance	4.66
Utilities	3.11
Dues & professional fees	3.10
Interest	4.05
Mach & bldg depreciation	22.85
Miscellaneous	2.49
Total overhead expenses per acre	59.32
Total dir & ovhd expenses per acre	366.80
Net return per acre	83.84
Government payments	9.75
Net return with govt pmts	93.59
Labor & management charge	27.82
Net return over lbr & mgt	65.77
<b>Cost of Production</b>	
Total direct expense per bu.	2.91
Total dir & ovhd exp per bu.	3.47
Less govt & other income	3.21
With labor & management	3.47
Net value per unit	4.09
Machinery cost per acre	86.87
Est. labor hours per acre	1.94

**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Return)**

**Soybeans on Owned Land**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	139	25	30	30
Number of farms	115	23	23	23
Acres	171.33	184.10	175.73	135.14
Yield per acre (bu.)	32.82	30.46	30.88	35.69
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	9.52	9.01	9.74	10.02
Total product return per acre	312.37	274.52	300.82	357.69
Hedging gains/losses per acre	0.41	0.11	1.76	-
Crop insurance per acre	41.72	24.38	51.11	53.12
Other crop income per acre	2.34	3.64	0.61	7.77
Gross return per acre	356.84	302.65	354.30	418.58
<b>Direct Expenses</b>				
Seed	37.66	38.24	36.07	35.80
Fertilizer	6.90	8.83	5.44	4.78
Crop chemicals	27.55	27.93	29.36	23.34
Crop insurance	25.90	29.01	22.30	27.27
Drying expense	0.51	1.73	0.44	0.21
Fuel & oil	19.40	20.05	18.50	16.65
Repairs	21.28	25.62	19.56	19.37
Custom hire	4.26	9.90	2.57	1.29
Machinery leases	0.50	1.58	0.17	0.40
Marketing	0.18	0.51	-	-
Operating interest	4.30	3.74	3.50	2.78
Miscellaneous	0.32	0.43	0.04	-
Total direct expenses per acre	148.77	167.58	137.94	131.88
Return over direct exp per acre	208.07	135.07	216.36	286.70
<b>Overhead Expenses</b>				
Custom hire	1.23	1.78	1.31	1.66
Hired labor	8.22	7.64	9.76	5.33
Machinery leases	1.17	0.97	1.52	1.50
Building leases	0.52	1.80	0.30	0.24
RE & pers. property taxes	12.24	9.75	13.12	11.07
Farm insurance	4.83	5.33	4.50	4.72
Utilities	3.15	3.86	3.48	2.69
Dues & professional fees	3.03	3.70	3.39	2.06
Interest	37.75	53.21	37.37	21.15
Mach & bldg depreciation	20.52	18.92	22.96	23.43
Miscellaneous	3.17	2.96	3.67	2.80
Total overhead expenses per acre	95.83	109.93	101.37	76.66
Total dir & ovhd expenses per acre	244.60	277.51	239.31	208.54
Net return per acre	112.24	25.14	114.99	210.04
Government payments	14.66	15.61	15.65	14.57
Net return with govt pmts	126.90	40.75	130.64	224.61
Labor & management charge	26.29	24.57	27.55	25.98
Net return over lbr & mgt	100.61	16.19	103.09	198.63
<b>Cost of Production</b>				
Total direct expense per bu.	4.53	5.50	4.47	3.70
Total dir & ovhd exp per bu.	7.45	9.11	7.75	5.84
Less govt & other income	5.65	7.68	5.51	3.73
With labor & management	6.45	8.48	6.40	4.46
Net value per unit	9.53	9.02	9.80	10.02
Machinery cost per acre	72.26	87.56	70.76	67.13
Est. labor hours per acre	1.45	1.54	1.51	1.18

**Crop Enterprise Analysis**  
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**(Farms Sorted By Net Return)**

**Soybeans on Cash Rent**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	276	44	54	58
Number of farms	176	35	35	36
Acres	386.89	317.54	455.89	355.03
Yield per acre (bu.)	32.30	28.43	33.51	33.53
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	9.55	9.24	9.13	10.30
Total product return per acre	308.53	262.69	305.83	345.22
Hedging gains/losses per acre	-0.53	-2.94	-0.08	0.31
Crop insurance per acre	45.42	34.80	41.02	68.41
Other crop income per acre	1.48	0.54	0.63	5.98
Gross return per acre	354.90	295.08	347.40	419.91
<b>Direct Expenses</b>				
Seed	39.36	42.94	40.98	36.58
Fertilizer	6.70	11.05	5.45	6.14
Crop chemicals	25.73	30.15	26.82	23.42
Crop insurance	25.75	25.40	26.46	26.55
Drying expense	0.55	0.84	0.74	0.04
Fuel & oil	18.83	20.91	17.90	18.34
Repairs	20.72	22.79	20.37	20.52
Custom hire	2.99	5.99	3.28	2.29
Hired labor	0.35	-	0.81	-
Land rent	76.11	74.86	76.34	74.55
Marketing	0.11	0.71	-	-
Operating interest	4.88	4.78	4.59	5.05
Miscellaneous	0.60	0.78	0.10	0.35
Total direct expenses per acre	222.66	241.19	223.84	213.83
Return over direct exp per acre	132.24	53.90	123.56	206.09
<b>Overhead Expenses</b>				
Custom hire	1.48	3.34	0.86	2.44
Hired labor	8.13	8.36	7.81	5.43
Machinery leases	3.18	2.23	3.11	3.11
Building leases	0.43	0.93	0.48	0.20
Farm insurance	4.18	4.43	3.74	4.31
Utilities	2.89	3.08	2.96	2.85
Dues & professional fees	3.17	3.21	2.60	2.83
Interest	4.50	6.30	4.42	3.69
Mach & bldg depreciation	18.26	16.89	17.11	20.03
Miscellaneous	3.29	2.95	3.69	2.71
Total overhead expenses per acre	49.52	51.72	46.79	47.59
Total dir & ovhd expenses per acre	272.18	292.91	270.63	261.42
Net return per acre	82.72	2.17	76.77	158.49
Government payments	14.14	14.47	13.92	14.90
Net return with govt pmts	96.86	16.64	90.69	173.39
Labor & management charge	24.00	24.43	25.08	25.13
Net return over lbr & mgt	72.86	-7.79	65.61	148.26
<b>Cost of Production</b>				
Total direct expense per bu.	6.89	8.48	6.68	6.38
Total dir & ovhd exp per bu.	8.43	10.30	8.08	7.80
Less govt & other income	6.55	8.66	6.42	5.12
With labor & management	7.30	9.51	7.17	5.87
Net value per unit	9.54	9.14	9.13	10.30
Machinery cost per acre	69.34	78.02	65.75	69.93
Est. labor hours per acre	1.29	1.31	1.25	1.10



**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
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**(Farms Sorted By Net Return)**

**Soybeans on Share Rent**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	43	10	10	9
Number of farms	30	6	6	6
Acres	134.57	122.13	104.66	125.69
Yield per acre (bu.)	34.63	31.87	30.86	39.16
Operators share of yield %	67.99	62.90	65.88	66.72
Value per bu.	9.36	9.07	9.45	10.20
Total product return per acre	220.39	181.86	192.05	266.59
Hedging gains/losses per acre	-0.03	-0.14	-	-
Crop insurance per acre	33.27	4.79	38.43	34.11
Other crop income per acre	1.27	-	-	3.33
Gross return per acre	254.90	186.51	230.48	304.03
<b>Direct Expenses</b>				
Seed	39.74	39.85	40.69	40.83
Fertilizer	2.17	6.32	1.83	-
Crop chemicals	23.08	31.92	19.74	22.64
Crop insurance	19.40	15.85	15.80	23.36
Fuel & oil	21.23	20.60	18.59	22.14
Repairs	25.40	23.74	18.06	21.50
Custom hire	2.61	1.33	1.02	4.18
Operating interest	5.43	5.96	3.47	3.85
Miscellaneous	0.11	0.14	0.43	-
Total direct expenses per acre	139.17	145.71	119.64	138.51
Return over direct exp per acre	115.73	40.81	110.84	165.52
<b>Overhead Expenses</b>				
Custom hire	0.67	0.35	1.28	0.02
Hired labor	10.96	12.20	7.91	9.37
Machinery leases	1.11	0.29	2.01	1.43
Building leases	0.33	1.27	0.00	0.03
Farm insurance	4.90	5.87	5.74	5.71
Utilities	3.14	2.40	4.15	3.34
Dues & professional fees	3.19	3.57	2.67	0.98
Interest	5.13	5.33	5.84	4.25
Mach & bldg depreciation	18.45	17.00	22.08	17.96
Miscellaneous	2.72	2.98	3.50	1.17
Total overhead expenses per acre	50.60	51.25	55.19	44.26
Total dir & ovhd expenses per acre	189.77	196.96	174.83	182.77
Net return per acre	65.13	-10.45	55.66	121.26
Government payments	10.71	9.69	13.11	10.27
Net return with govt pmts	75.84	-0.76	68.77	131.52
Labor & management charge	27.32	23.82	26.73	27.36
Net return over lbr & mgt	48.52	-24.58	42.04	104.16
<b>Cost of Production</b>				
Total direct expense per bu.	5.91	7.27	5.89	5.30
Total dir & ovhd exp per bu.	8.06	9.83	8.60	7.00
Less govt & other income	6.14	9.11	6.06	5.17
With labor & management	7.30	10.30	7.38	6.22
Net value per unit	9.36	9.07	9.45	10.20
Machinery cost per acre	73.78	67.87	68.76	70.60
Est. labor hours per acre	1.46	1.76	0.96	1.79

**Crop Enterprise Analysis**  
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**Soybeans, Food on Cash Rent**

	<b>Avg. Of All Farms</b>
Number of fields	8
Number of farms	8
Acres	258.23
Yield per acre (bu.)	26.79
Operators share of yield %	100.00
Value per bu.	11.73
Total product return per acre	314.23
Crop insurance per acre	44.89
Other crop income per acre	1.39
Gross return per acre	360.50
<b>Direct Expenses</b>	
Seed	16.68
Fertilizer	9.98
Crop chemicals	42.59
Crop insurance	23.72
Fuel & oil	20.78
Repairs	21.75
Custom hire	6.82
Hired labor	0.75
Land rent	74.70
Operating interest	7.41
Total direct expenses per acre	225.18
Return over direct exp per acre	135.32
<b>Overhead Expenses</b>	
Custom hire	0.92
Hired labor	2.54
Machinery leases	6.34
Building leases	0.73
Farm insurance	4.29
Utilities	2.33
Dues & professional fees	4.33
Interest	2.38
Mach & bldg depreciation	14.95
Miscellaneous	5.08
Total overhead expenses per acre	43.90
Total dir & ovhd expenses per acre	269.08
Net return per acre	91.42
Government payments	14.90
Net return with govt pmts	106.31
Labor & management charge	28.63
Net return over lbr & mgt	77.69
<b>Cost of Production</b>	
Total direct expense per bu.	8.41
Total dir & ovhd exp per bu.	10.05
Less govt & other income	7.76
With labor & management	8.83
Net value per unit	11.73
Machinery cost per acre	73.24
Est. labor hours per acre	1.40

**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Return)**

**Sugar Beets on Owned Land Excluding Joint venture**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	51	8	13	9
Number of farms	40	8	8	8
Acres	119.53	160.39	117.37	102.94
Yield per acre (ton)	17.89	8.72	20.87	27.01
Operators share of yield %	100.00	100.00	100.00	100.00
Value per ton	43.12	54.47	41.43	42.46
Total product return per acre	771.38	475.15	864.51	1,147.08
Crop insurance per acre	124.41	228.36	67.30	-
Other crop income per acre	2.17	1.40	4.81	-
Gross return per acre	897.97	704.91	936.61	1,147.08
<b>Direct Expenses</b>				
Seed	96.78	122.07	96.61	71.61
Fertilizer	72.74	75.56	70.01	69.62
Crop chemicals	87.74	81.31	78.77	108.83
Crop insurance	21.92	29.44	17.43	22.11
Fuel & oil	77.95	80.65	80.22	78.16
Repairs	98.86	130.06	117.32	60.35
Custom hire	11.17	5.23	7.18	18.89
Hired labor	30.26	20.84	35.18	35.79
Machinery leases	0.60	1.12	-	0.11
Hauling and trucking	9.33	1.50	15.05	25.05
Operating interest	13.17	16.92	13.02	5.44
Miscellaneous	3.38	1.92	5.25	7.91
Total direct expenses per acre	523.89	566.62	536.02	503.86
Return over direct exp per acre	374.07	138.29	400.59	643.21
<b>Overhead Expenses</b>				
Custom hire	6.45	2.35	9.63	5.27
Hired labor	40.50	67.04	29.03	20.52
Machinery leases	5.66	8.64	3.80	5.66
Building leases	1.28	-	0.15	7.32
RE & pers. property taxes	13.27	19.23	11.14	9.78
Farm insurance	12.02	11.43	12.67	17.33
Utilities	5.63	6.29	4.09	9.64
Dues & professional fees	4.26	4.74	5.10	5.34
Interest	48.58	75.13	47.08	18.29
Mach & bldg depreciation	80.77	82.06	77.18	86.13
Miscellaneous	6.20	8.03	6.61	5.52
Total overhead expenses per acre	224.62	284.96	206.47	190.81
Total dir & ovhd expenses per acre	748.51	851.58	742.49	694.68
Net return per acre	149.45	-146.67	194.12	452.40
Government payments	15.22	15.73	15.09	14.13
Net return with govt pmts	164.67	-130.95	209.21	466.53
Labor & management charge	106.73	109.13	88.81	170.98
Net return over lbr & mgt	57.94	-240.08	120.40	295.56
<b>Cost of Production</b>				
Total direct expense per ton	29.28	64.95	25.69	18.65
Total dir & ovhd exp per ton	41.84	97.62	35.58	25.72
Less govt & other income	33.91	69.48	31.41	25.19
With labor & management	39.88	81.99	35.66	31.52
Net value per unit	43.12	54.47	41.43	42.46
Machinery cost per acre	298.58	334.73	317.89	261.68
Est. labor hours per acre	5.66	5.93	5.93	7.00

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**Sugar Beets on Owned Land Including Joint venture**

	<u>Avg. Of All Farms</u>	<u>High 20%</u>
Number of fields	21	5
Number of farms	21	5
Acres	87.37	102.78
Yield per acre (ton)	20.88	25.82
Operators share of yield %	100.00	100.00
Value per ton	41.18	42.61
Total product return per acre	859.68	1,099.90
Crop insurance per acre	69.58	-
Other crop income per acre	0.10	-
Gross return per acre	929.36	1,099.90
<b>Direct Expenses</b>		
Seed	99.44	95.74
Fertilizer	82.36	86.99
Crop chemicals	93.85	74.94
Crop insurance	19.99	24.41
Fuel & oil	78.86	71.67
Repairs	91.17	59.99
Custom hire	11.48	17.02
Hired labor	22.96	20.68
Stock/quota lease	181.23	201.30
Hauling and trucking	14.3	15.54
Operating interest	20.13	15.54
Miscellaneous	16.11	-
Total direct expenses per acre	732.60	668.30
Return over direct exp per acre	196.76	431.61
<b>Overhead Expenses</b>		
Custom hire	5.55	10.17
Hired labor	27.81	31.35
Machinery leases	5.88	4.29
Building leases	0.43	0.79
RE & pers. property taxes	10.78	11.09
Farm insurance	6.04	8.39
Utilities	2.76	2.99
Dues & professional fees	4.97	2.96
Interest	66.02	57.87
Mach & bldg depreciation	69.55	81.64
Miscellaneous	4.69	4.47
Total overhead expenses per acre	204.49	216.02
Total dir & ovhd expenses per acre	937.09	884.32
Net return per acre	-7.73	215.59
Government payments	15.03	16.61
Net return with govt pmts	7.29	232.20
Labor & management charge	89.20	92.19
Net return over lbr & mgt	-81.91	140.01
<b>Cost of Production</b>		
Total direct expense per ton	35.09	25.89
Total dir & ovhd exp per ton	44.89	34.25
Less govt & other income	40.83	33.61
With labor & management	45.10	37.18
Net value per unit	41.18	42.61
Machinery cost per acre	277.06	261.89
Est. labor hours per acre	5.16	4.77

**Crop Enterprise Analysis**  
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**Sugar Beets on Cash Rent Excluding Joint venture**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	118	27	20	24
Number of farms	76	15	15	16
Acres	139.01	108.36	175.26	103.97
Yield per acre (ton)	19.79	12.72	21.30	27.60
Operators share of yield %	100.00	100.00	100.00	100.00
Value per ton	40.94	41.04	39.67	42.05
Total product return per acre	810.28	521.91	845.01	1,160.64
Crop insurance per acre	108.00	211.27	58.73	8.67
Other crop income per acre	7.21	2.29	-	7.74
Gross return per acre	925.49	735.47	903.75	1,177.05
<b>Direct Expenses</b>				
Seed	89.09	95.98	97.11	79.52
Fertilizer	71.94	81.87	67.23	66.80
Crop chemicals	97.34	104.49	83.92	94.71
Crop insurance	22.14	24.64	20.17	21.67
Fuel & oil	73.08	85.09	65.27	75.63
Repairs	78.13	102.95	77.22	55.04
Custom hire	11.62	10.68	9.71	22.91
Hired labor	32.54	23.10	36.10	35.68
Land rent	89.92	100.35	89.67	76.38
Hauling and trucking	11.70	6.44	20.92	8.69
Operating interest	16.49	18.26	16.97	6.97
Miscellaneous	2.30	1.63	2.38	3.52
Total direct expenses per acre	596.28	655.49	586.66	547.51
Return over direct exp per acre	329.22	79.98	317.09	629.54
<b>Overhead Expenses</b>				
Custom hire	4.28	1.10	1.97	6.31
Hired labor	31.90	53.94	33.38	17.34
Machinery leases	13.57	12.99	19.29	7.05
Building leases	1.63	2.16	0.23	7.58
Farm insurance	9.44	7.83	6.98	13.91
Utilities	4.94	4.87	3.86	6.17
Dues & professional fees	4.11	3.43	2.99	4.51
Interest	17.74	17.73	12.52	18.31
Mach & bldg depreciation	67.45	68.89	59.94	74.01
Miscellaneous	7.40	7.30	6.47	7.08
Total overhead expenses per acre	162.46	180.24	147.62	162.28
Total dir & ovhd expenses per acre	758.74	835.73	734.28	709.79
Net return per acre	166.75	-100.26	169.46	467.26
Government payments	14.57	13.40	17.10	15.23
Net return with govt pmts	181.33	-86.86	186.57	482.49
Labor & management charge	99.80	91.11	93.08	141.55
Net return over lbr & mgt	81.52	-177.97	93.48	340.93
<b>Cost of Production</b>				
Total direct expense per ton	30.13	51.54	27.54	19.84
Total dir & ovhd exp per ton	38.34	65.71	34.47	25.72
Less govt & other income	31.78	47.87	30.91	24.57
With labor & management	36.82	55.03	35.28	29.70
Net value per unit	40.94	41.04	39.67	42.05
Machinery cost per acre	263.30	294.80	242.91	257.80
Est. labor hours per acre	5.48	5.45	6.29	6.10

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**Sugar Beets on Cash Rent Including Joint venture**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	92	16	14	18
Number of farms	63	12	12	13
Acres	164.85	197.59	261.98	112.63
Yield per acre (ton)	20.98	15.39	21.47	25.70
Operators share of yield %	100.00	100.00	100.00	100.00
Value per ton	42.38	48.72	40.91	43.15
Total product return per acre	889.17	750.04	878.25	1,108.84
Crop insurance per acre	56.98	98.77	77.36	4.29
Other crop income per acre	2.75	0.03	10.53	1.48
Gross return per acre	948.90	848.84	966.14	1,114.61
<b>Direct Expenses</b>				
Seed	93.61	81.72	105.27	73.99
Fertilizer	75.53	82.59	73.35	71.56
Crop chemicals	89.94	114.29	85.10	95.96
Crop insurance	21.77	25.80	21.28	18.56
Fuel & oil	75.05	97.52	55.40	80.55
Repairs	80.69	105.84	77.31	57.87
Custom hire	16.09	3.61	24.59	19.85
Hired labor	27.44	31.75	19.72	23.35
Land rent	86.61	96.12	97.39	63.34
Stock/quota lease	216.11	221.56	235.08	206.92
Machinery leases	2.18	-	7.06	0.18
Hauling and trucking	5.56	0.71	5.85	1.32
Operating interest	26.44	40.19	30.96	10.32
Miscellaneous	1.51	4.50	0.21	0.89
Total direct expenses per acre	818.54	906.20	838.58	724.64
Return over direct exp per acre	130.36	-57.36	127.57	389.97
<b>Overhead Expenses</b>				
Custom hire	4.07	1.44	3.93	7.64
Hired labor	31.95	48.48	13.57	15.98
Machinery leases	16.50	30.21	25.26	7.32
Building leases	0.46	1.58	-	0.32
Farm insurance	6.70	8.54	4.35	9.83
Utilities	4.79	5.15	3.89	5.60
Dues & professional fees	5.54	4.74	5.64	5.16
Interest	17.86	28.95	18.53	13.35
Mach & bldg depreciation	55.23	74.44	46.99	58.59
Miscellaneous	7.11	12.51	3.58	8.36
Total overhead expenses per acre	150.21	216.04	125.72	132.16
Total dir & ovhd expenses per acre	968.75	1,122.25	964.29	856.80
Net return per acre	-19.85	-273.40	1.85	257.81
Government payments	13.02	11.89	12.28	14.72
Net return with govt pmts	-6.82	-261.51	14.13	272.53
Labor & management charge	87.73	88.32	87.83	97.75
Net return over lbr & mgt	-94.55	-349.83	-73.70	174.78
<b>Cost of Production</b>				
Total direct expense per ton	39.01	58.86	39.06	28.20
Total dir & ovhd exp per ton	46.17	72.90	44.92	33.34
Less govt & other income	42.70	65.71	40.25	32.55
With labor & management	46.88	71.44	44.34	36.35
Net value per unit	42.38	48.72	40.91	43.15
Machinery cost per acre	264.71	338.88	256.20	242.48
Est. labor hours per acre	6.07	5.06	8.47	5.16

**Crop Enterprise Analysis**  
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**Sunflowers on Cash Rent**

	<b>Avg. Of All Farms</b>
Number of fields	11
Number of farms	11
Acres	212.37
Yield per acre (cwt.)	16.93
Operators share of yield %	100.00
Value per cwt.	27.06
Total product return per acre	458.03
Crop insurance per acre	25.37
Gross return per acre	483.40
<b>Direct Expenses</b>	
Seed	29.04
Fertilizer	64.58
Crop chemicals	29.54
Crop insurance	26.59
Fuel & oil	24.06
Repairs	28.47
Custom hire	5.08
Land rent	68.24
Machinery leases	0.84
Utilities	0.76
Marketing	4.03
Operating interest	6.79
Miscellaneous	0.69
Total direct expenses per acre	288.70
Return over direct exp per acre	194.70
<b>Overhead Expenses</b>	
Custom hire	1.67
Hired labor	11.16
Machinery leases	5.21
Farm insurance	4.20
Utilities	2.59
Dues & professional fees	2.56
Interest	7.47
Mach & bldg depreciation	18.62
Miscellaneous	3.59
Total overhead expenses per acre	57.06
Total dir & ovhd expenses per acre	345.76
Net return per acre	137.64
Government payments	14.07
Net return with govt pmts	151.70
Labor & management charge	27.36
Net return over lbr & mgt	124.34
<b>Cost of Production</b>	
Total direct expense per cwt.	17.06
Total dir & ovhd exp per cwt.	20.43
Less govt & other income	18.10
With labor & management	19.71
Net value per unit	27.06
Machinery cost per acre	91.06
Est. labor hours per acre	1.53

**Crop Enterprise Analysis**  
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**Red River Valley, 2008**  
**(Farms Sorted By Net Return)**

**Wheat, Spring on Owned Land**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	117	20	24	24
Number of farms	97	19	20	20
Acres	211.10	210.77	220.36	202.35
Yield per acre (bu.)	64.03	55.95	59.93	73.84
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	6.72	6.12	6.41	7.29
Total product return per acre	430.04	342.45	384.38	538.61
Hedging gains/losses per acre	-0.56	-3.30	-	-
Crop insurance per acre	2.43	4.16	0.98	4.27
Other crop income per acre	0.31	0.03	0.29	1.07
Gross return per acre	432.22	343.35	385.65	543.95
<b>Direct Expenses</b>				
Seed	27.45	28.40	25.27	25.78
Fertilizer	66.97	76.62	60.49	64.47
Crop chemicals	26.45	26.75	22.98	24.76
Crop insurance	28.09	34.57	22.59	23.26
Fuel & oil	19.67	22.51	20.26	19.87
Repairs	19.92	21.78	18.36	20.19
Custom hire	3.92	4.26	5.00	1.49
Hired labor	0.20	-	-	0.83
Machinery leases	0.36	0.25	-	1.43
Marketing	0.53	0.18	-	-
Operating interest	4.65	4.86	3.94	6.16
Miscellaneous	0.72	0.97	0.26	0.37
Total direct expenses per acre	198.93	221.16	179.15	188.62
Return over direct exp per acre	233.29	122.18	206.51	355.34
<b>Overhead Expenses</b>				
Custom hire	2.20	3.82	1.52	0.67
Hired labor	8.57	8.12	9.12	6.00
Machinery leases	2.31	3.34	3.00	4.84
Building leases	0.32	0.10	0.66	0.56
RE & pers. property taxes	11.45	12.38	11.41	13.74
Farm insurance	4.68	4.52	4.57	4.90
Utilities	3.06	3.01	2.50	3.64
Dues & professional fees	2.75	2.82	1.79	2.91
Interest	32.43	49.13	26.05	27.46
Mach & bldg depreciation	18.06	17.48	14.35	17.93
Miscellaneous	3.54	4.07	3.96	1.73
Total overhead expenses per acre	89.36	108.77	78.91	84.38
Total dir & ovhd expenses per acre	288.29	329.94	258.06	272.99
Net return per acre	143.93	13.41	127.59	270.96
Government payments	14.75	14.60	13.56	15.81
Net return with govt pmts	158.67	28.01	141.15	286.77
Labor & management charge	22.35	21.86	18.09	25.15
Net return over lbr & mgt	136.33	6.14	123.06	261.62
<b>Cost of Production</b>				
Total direct expense per bu.	3.11	3.95	2.99	2.55
Total dir & ovhd exp per bu.	4.50	5.90	4.31	3.70
Less govt & other income	4.24	5.62	4.06	3.41
With labor & management	4.59	6.01	4.36	3.75
Net value per unit	6.71	6.06	6.41	7.29
Machinery cost per acre	69.94	78.06	66.26	70.36
Est. labor hours per acre	1.34	1.44	1.13	1.19



**Crop Enterprise Analysis**  
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**Wheat, Spring on Cash Rent**

	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	261	47	69	55
Number of farms	157	31	32	32
Acres	291.78	289.55	209.44	361.49
Yield per acre (bu.)	63.47	53.51	63.03	71.03
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	6.74	6.03	6.64	7.19
Total product return per acre	427.98	322.80	418.83	510.44
Hedging gains/losses per acre	-2.96	-0.37	-2.26	-0.25
Crop insurance per acre	2.57	5.96	0.83	1.07
Other crop income per acre	0.68	0.73	0.09	1.38
Gross return per acre	428.28	329.11	417.50	512.63
<b>Direct Expenses</b>				
Seed	27.89	30.37	25.45	27.84
Fertilizer	72.36	80.75	68.59	69.75
Crop chemicals	28.40	26.39	28.29	30.21
Crop insurance	29.22	28.96	26.98	28.77
Drying expense	0.51	0.53	1.07	0.41
Fuel & oil	18.35	19.34	17.98	16.60
Repairs	18.50	19.48	19.23	16.29
Custom hire	4.38	3.57	5.29	3.30
Hired labor	0.27	0.20	0.51	0.01
Land rent	73.60	72.64	77.36	70.52
Machinery leases	0.68	1.55	0.26	1.36
Marketing	0.23	0.66	-	-
Operating interest	4.02	4.46	5.89	2.59
Miscellaneous	0.47	0.71	0.24	0.43
Total direct expenses per acre	278.89	289.61	277.14	268.10
Return over direct exp per acre	149.38	39.50	140.36	244.53
<b>Overhead Expenses</b>				
Custom hire	1.75	1.61	0.77	1.79
Hired labor	7.58	5.64	8.29	6.70
Machinery leases	2.56	2.51	3.64	2.60
Building leases	0.46	0.89	0.69	0.37
Farm insurance	3.98	3.73	4.85	3.32
Utilities	2.76	2.57	3.02	2.69
Dues & professional fees	2.83	2.86	2.83	2.87
Interest	4.23	4.93	4.54	3.47
Mach & bldg depreciation	15.64	14.23	14.41	15.28
Miscellaneous	3.39	3.66	3.50	2.48
Total overhead expenses per acre	45.18	42.65	46.53	41.57
Total dir & ovhd expenses per acre	324.07	332.26	323.67	309.67
Net return per acre	104.20	-3.15	93.83	202.96
Government payments	14.46	13.22	14.24	15.16
Net return with govt pmnts	118.66	10.07	108.07	218.12
Labor & management charge	23.24	22.27	22.83	24.94
Net return over lbr & mgt	95.42	-12.20	85.24	193.18
<b>Cost of Production</b>				
Total direct expense per bu.	4.39	5.41	4.40	3.77
Total dir & ovhd exp per bu.	5.11	6.21	5.14	4.36
Less govt & other income	4.87	5.84	4.93	4.12
With labor & management	5.24	6.26	5.29	4.47
Net value per unit	6.70	6.03	6.61	7.18
Machinery cost per acre	65.38	66.56	65.62	60.10
Est. labor hours per acre	1.28	1.20	1.33	1.22

**Crop Enterprise Analysis**  
**Minnesota and North Dakota Farm Business Management Education**  
**Red River Valley, 2008**  
**(Farms Sorted By Net Return)**

**Wheat, Spring on Share Rent**

	<u>Avg. Of All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of fields	47	5	6	18
Number of farms	25	5	5	5
Acres	104.04	103.80	91.85	94.61
Yield per acre (bu.)	61.98	54.63	58.23	69.47
Operators share of yield %	66.37	68.48	56.71	66.24
Value per bu.	6.53	6.12	7.11	6.54
Total product return per acre	268.75	228.96	234.91	300.92
Crop insurance per acre	3.72	-	-	-
Other crop income per acre	5.73	1.61	-	13.86
Gross return per acre	278.19	230.58	234.91	314.78
<b>Direct Expenses</b>				
Seed	28.51	34.54	23.65	28.41
Fertilizer	66.38	77.76	59.88	65.49
Crop chemicals	20.84	24.49	22.20	23.94
Crop insurance	16.97	20.90	13.38	17.85
Fuel & oil	17.32	19.91	19.21	16.41
Repairs	18.62	24.97	17.10	11.81
Custom hire	2.24	-	4.69	-
Operating interest	3.59	5.31	6.20	1.18
Total direct expenses per acre	174.47	207.88	166.33	165.10
Return over direct exp per acre	103.72	22.70	68.58	149.68
<b>Overhead Expenses</b>				
Custom hire	0.72	1.69	0.08	0.89
Hired labor	6.23	5.92	7.02	1.20
Machinery leases	1.40	0.73	2.30	2.76
Building leases	1.09	0.46	0.10	2.37
Farm insurance	5.48	5.13	3.98	4.99
Utilities	3.39	2.65	1.73	3.25
Dues & professional fees	2.53	3.01	0.97	1.21
Interest	4.61	6.39	3.33	3.99
Mach & bldg depreciation	16.14	11.83	12.86	18.63
Miscellaneous	2.85	3.69	0.59	2.63
Total overhead expenses per acre	44.44	41.50	32.96	41.91
Total dir & ovhd expenses per acre	218.91	249.38	199.28	207.01
Net return per acre	59.28	-18.80	35.63	107.77
Government payments	10.22	10.51	10.03	9.29
Net return with govt pmts	69.50	-8.29	45.65	117.05
Labor & management charge	24.79	27.76	22.40	27.85
Net return over lbr & mgt	44.71	-36.05	23.25	89.21
<b>Cost of Production</b>				
Total direct expense per bu.	4.24	5.56	5.04	3.59
Total dir & ovhd exp per bu.	5.32	6.67	6.04	4.50
Less govt & other income	4.84	6.34	5.73	4.00
With labor & management	5.45	7.08	6.41	4.60
Net value per unit	6.53	6.12	7.11	6.54
Machinery cost per acre	60.64	65.16	59.07	54.24
Est. labor hours per acre	1.18	1.53	1.49	1.19