



MINNESOTA STATE

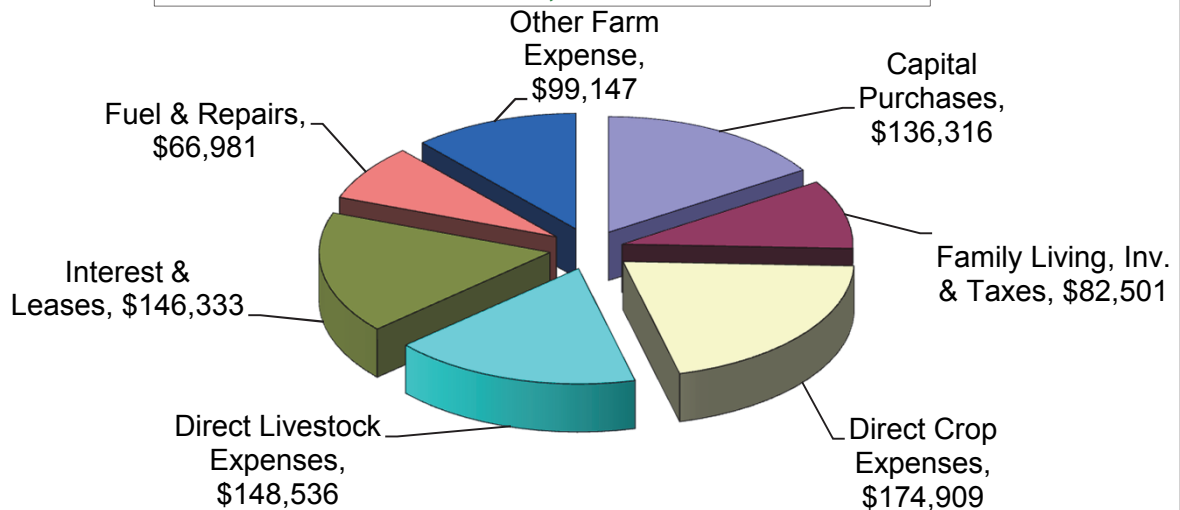
# Farm Business Management Program Database (2164 Farms)

## State Executive Summary - 2017

Financial Summaries & Financial Standards for 2014-2017  
Current year data by Region, Farm Type, & Years Farming

April, 2018

Average Money Spent by each Farm totals  
**\$831,788**



In Cooperation with the Center for Farm Financial Management, University of Minnesota  
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Farm Business Management Website at: [agcentric.org](http://agcentric.org) or [centerofagriculture.org](http://centerofagriculture.org)

## Brief Overview of 2017 in Production Agriculture

### Farm Business Management Program Database

Minnesota farmers experienced their fifth consecutive year of low profitability in 2017. This is one of the key findings in the annual report developed by the Minnesota State farm business management education program in cooperation with the University of Minnesota. The analysis used data from 2,164 participants in the Minnesota State farm business management education database. Participating producers represent approximately 10 percent of commercial farmers in Minnesota.

The median farm earned \$26,556, up slightly from just over \$25,654 in 2016. Declines in farm income were largely driven by low profits and losses for cash crop farms, while livestock farms, in general, had a better year. With average investment just under \$3 million, farms earned a 2.2% return on investment. Across all farms types, almost one third of farms lost net worth in 2017.

For the third consecutive year, Minnesota farmers produced bumper crops of Minnesota's primary cash crops, corn and soybeans. Similar to the two previous years, high yields did not produce high profits. The median crop farm earned \$21,920, down from \$43,705 in 2016.

Profits were up slightly for each of Minnesota's major types of livestock operations: dairy, pork and beef. The median livestock producer earned only \$47,902 from farm operations for the year. Hog producers had a big turn-around, after many lost money on pig production in 2017. For dairy and beef producers, however, profits remained at low levels by historical standards.

Most Minnesota farmers are still in reasonably good shape financially, even after five years of low earnings. The average farm's debt to asset ratio at 46%, an increase of 1 percent from 2016. Working capital has declined from 2012 to now, which is at a 5 year low of \$192,178.

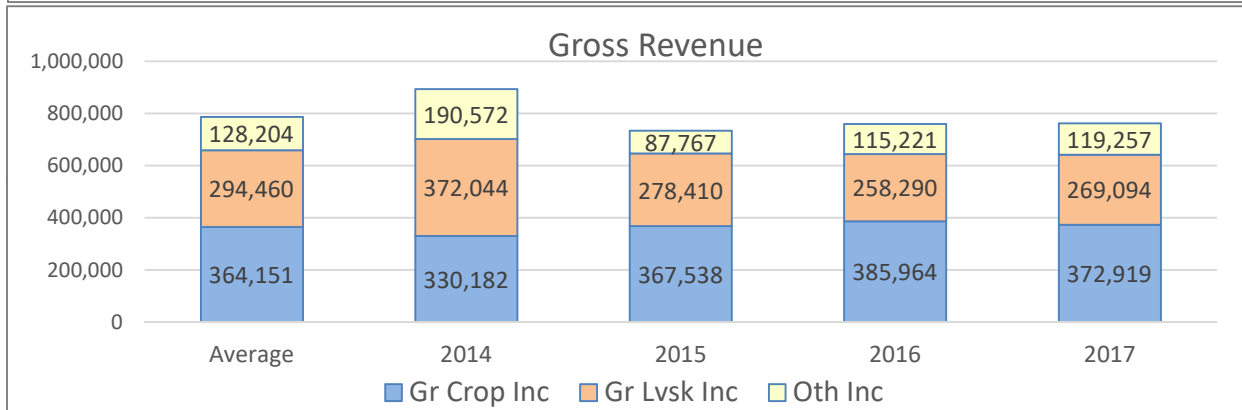
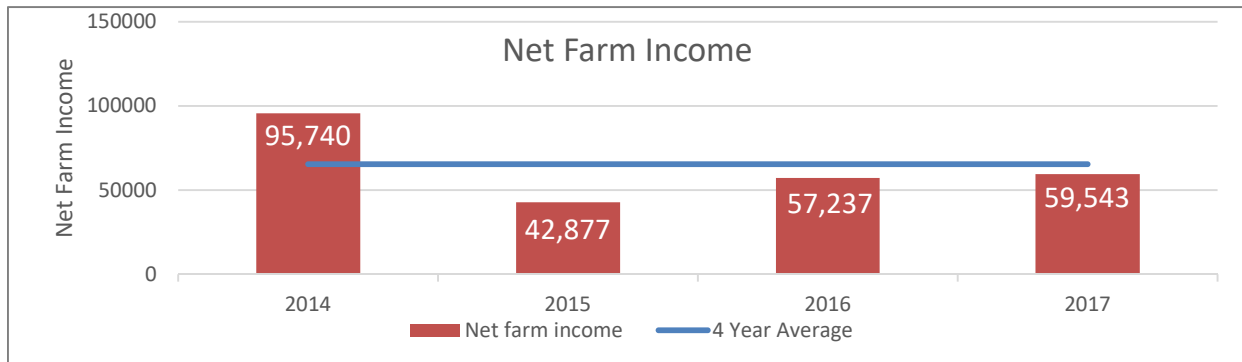
#### What is Net Farm Income used for?

Net Farm Income dollars are used to pay for Family Living, Social Security and Income Tax, Retirement Accounts, Medical and Health expenses, and loan principle payments. The list below shows the data for the current year. A positive balance indicates that there is revenue available for other uses, while a negative balance indicates there is a need for revenue from other sources.

		<u>State Data</u>
Net Farm Income		\$59,543
Depreciation	(plus)	\$51,002
Family Living (Excl Health/Med)	(minus)	\$49,652
Social Security and Income Tax	(minus)	\$9,829
Health and Medical Expense	(minus)	\$9,891
Retirement Accounts	(minus)	\$1,781
Principal Payments	(minus)	\$63,286
Balance		-\$23,894

**Summary Farm Income Statement**  
**(Farms Sorted by Years)**  
**Minnesota State - Farm Business Management**

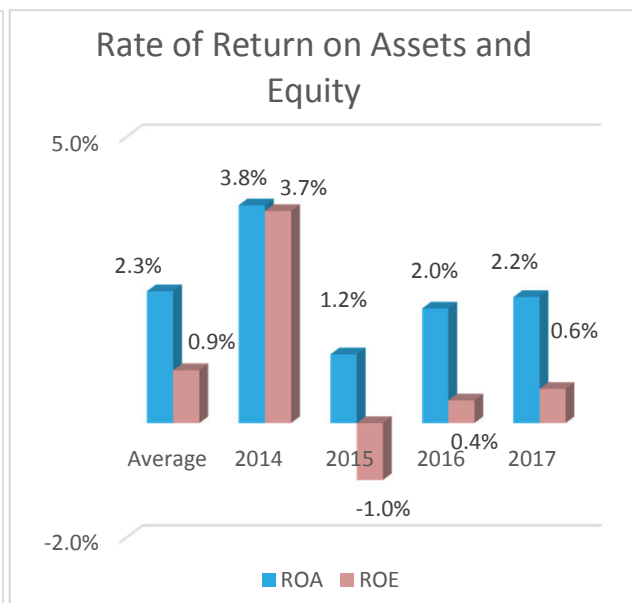
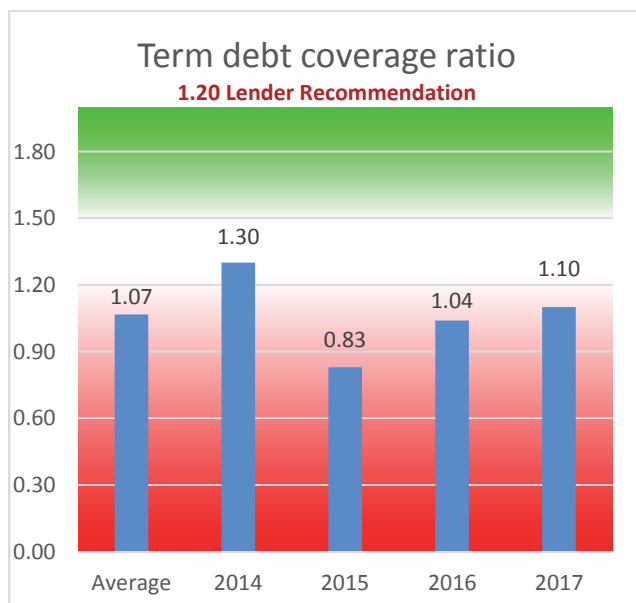
	<u>Average</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>
Number of farms	2086	2047	2031	2103	2164
<b>Farm Revenue</b>					
Crop sales	358,783	367,914	330,589	369,807	366,823
Crop inventory change	5,367	-37,733	36,949	16,157	6,096
Gross crop income	364,151	330,182	367,538	385,964	372,919
Livestock sales	293,535	351,689	290,405	267,230	264,814
Livestock inventory change	925	20,355	-11,994	-8,940	4,280
Gross livestock income	294,460	372,044	278,410	258,290	269,094
Government payments	19,879	8,268	32,682	22,205	16,361
Other cash income	104,907	139,656	112,729	80,100	87,142
Other accrual changes	1,709	21,324	-28,822	6,458	7,877
<b>Gross revenue</b>	<b>785,105</b>	<b>871,474</b>	<b>762,537</b>	<b>753,016</b>	<b>753,393</b>
<b>Farm Expenses</b>					
Cash operating expenses	627,596	685,344	625,111	599,291	600,637
Inventory Changes	7,123	2,329	8,772	9,448	7,543
Depreciation	53,455	56,012	53,309	53,496	51,002
Total operating expense	688,073	743,685	687,192	662,234	659,181
Interest paid	33,805	32,688	32,394	34,867	35,269
Change in accrued interest	817	693	1,027	407	1,140
Total interest expense	34,621	33,381	33,422	35,273	36,409
<b>Total expense</b>	<b>722,694</b>	<b>777,067</b>	<b>720,613</b>	<b>697,507</b>	<b>695,590</b>
Net farm income from operations	62,411	94,408	41,924	55,509	57,803
Gain or loss on capital sales	1,439	1,333	953	1,728	1,740
<b>Net farm income</b>	<b>63,849</b>	<b>95,740</b>	<b>42,877</b>	<b>57,237</b>	<b>59,543</b>



## Financial Summary (Farms Sorted by Years)

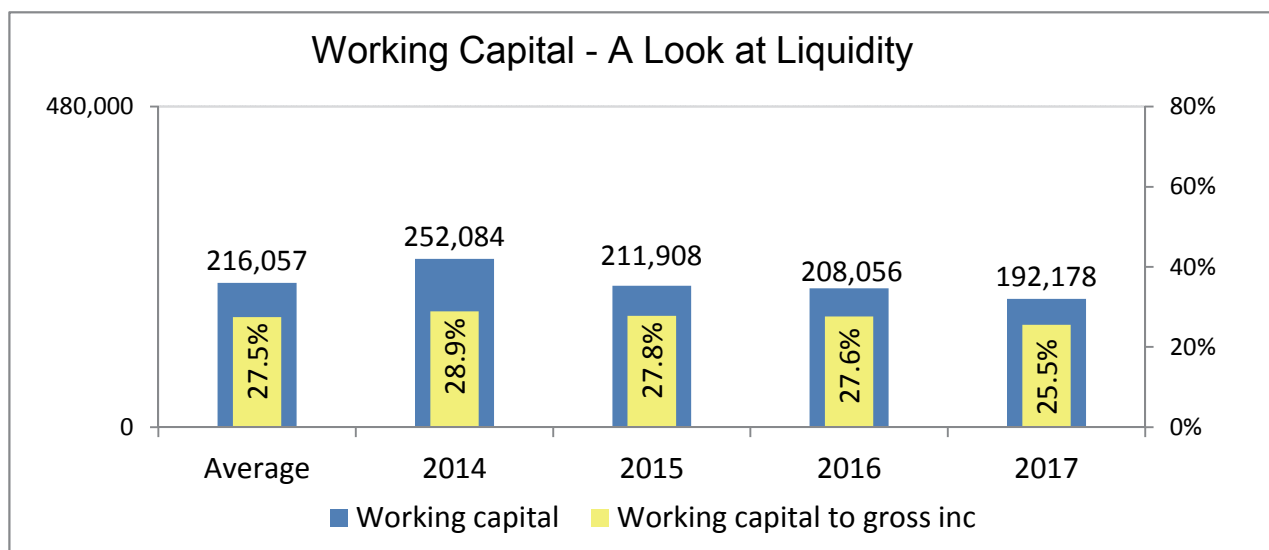
### Minnesota State - Farm Business Management

	<u>Average</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>
Number of farms	2086	2047	2031	2103	2164
<b>Income Statement</b>					
Gross cash farm income	\$777,104	867,528	766,404	739,342	735,140
Total cash farm expense	\$661,400	718,033	657,505	634,157	635,906
Net cash farm income	\$115,703	149,495	108,899	105,184	99,234
Average net farm income	\$63,849	95,740	42,877	57,237	59,543
Median net farm income	<b>\$31,805</b>	<b>40,950</b>	<b>25,392</b>	<b>34,321</b>	<b>26,556</b>
<b>Profitability (cost)</b>					
Rate of return on assets	2.3%	3.8%	1.2%	2.0%	2.2%
Rate of return on equity	0.9%	3.7%	-1.0%	0.4%	0.6%
Operating profit margin	6.8%	10.5%	3.6%	6.2%	6.8%
Asset turnover rate	33.1%	35.9%	32.3%	31.9%	32.1%
<b>Liquidity &amp; Repayment (end of year)</b>					
Current ratio	1.26	1.77	1.64	1.63	1.57%
Working capital	216057	252,084	211,908	208,056	192,178
Working capital to gross inc	27%	28.9%	27.8%	27.6%	25.5%
Term debt coverage ratio	1.07	1.30	0.83	1.04	1.10
<b>Solvency (end of year at market)</b>					
Total assets	2723640	2,899,931	2,816,577	2,222,146	2,955,907
Total liabilities	1159390	1,213,523	1,204,953	957,420	1,261,663
Net worth	1564251	1,686,407	1,611,624	1,264,726	1,694,245
Farm debt to asset ratio	45%	43%	45%	46%	45%
<b>Nonfarm Information</b>					
Net nonfarm income	32,763	31,013	33,868	33,082	33,090
Farms reporting living expenses	468	505	470	453	442
Total family living expense	60,549	63,938	60,798	58,526	58,933
Total living, invest, & capital	91,647	103,691	97,314	80,890	84,694



**Financial Standards Measures**  
**(Farms Sorted by Years)**  
**Minnesota State - Farm Business Management**

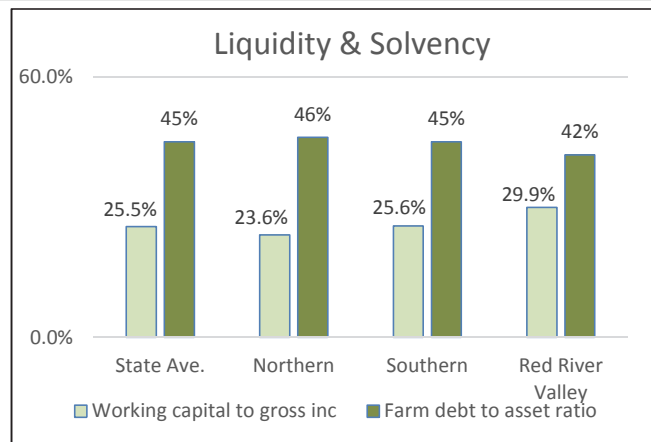
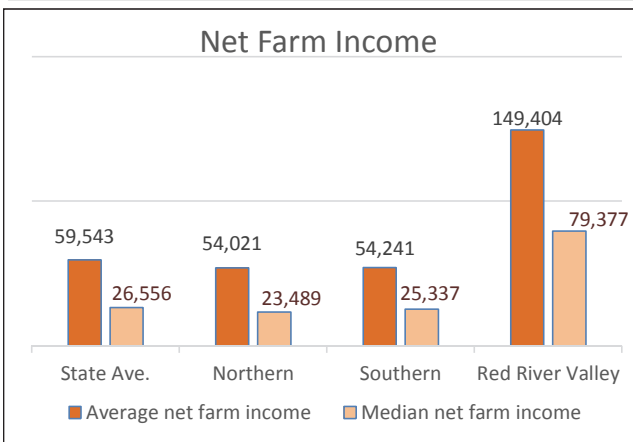
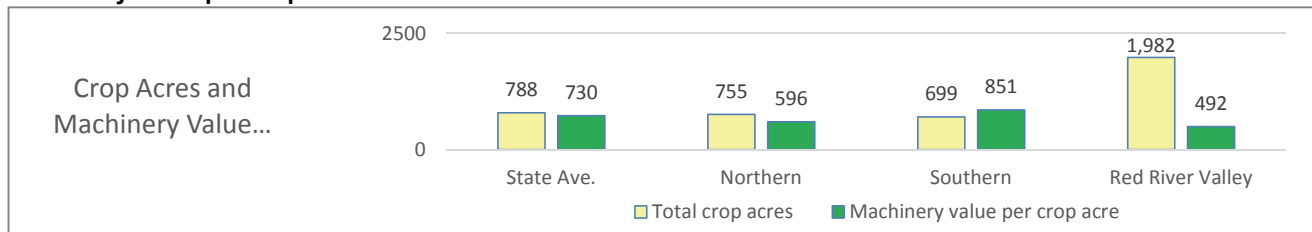
	<u>Average</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>
Number of farms	2086	2047	2031	2103	2164
<b>Liquidity</b>					
Current ratio	1.65	1.77	1.64	1.63	1.57
Working capital	216,057	252,084	211,908	208,056	192,178
Working capital to gross inc	27.5%	28.9%	27.8%	27.6%	25.5%
<b>Solvency (market)</b>					
Farm debt to asset ratio	44.5%	43%	45%	45%	45%
Farm equity to asset ratio	55.5%	57%	55%	55%	55%
Farm debt to equity ratio	0.81	0.77	0.82	0.82	0.82
<b>Profitability (cost)</b>					
Rate of return on farm assets	2.3%	3.8%	1.2%	2.0%	2.2%
Rate of return on farm equity	0.9%	3.7%	-1.0%	0.4%	0.6%
Operating profit margin	6.8%	10.5%	3.6%	6.2%	6.8%
Net farm income	63,849	95,740	42,877	57,237	59,543
EBIDTA	150,487	183,801	128,655	144,279	145,214
<b>Repayment Capacity</b>					
Capital debt repayment capacity	97,635	121,650	76,187	95,471	97,230
Capital debt repayment margin	6,341	28,372	-15,363	3,710	8,645
Replacement margin	-19,379	5,755	-39,205	-23,718	-20,346
Term debt coverage ratio	1.07	1.30	0.83	1.04	1.10
Replacement coverage ratio	0.84	1.05	0.66	0.80	0.83
<b>Efficiency</b>					
Asset turnover rate (cost)	33.1%	35.9%	32.3%	31.9%	32.1%
Operating expense ratio	80.9%	78.9%	83.1%	80.8%	80.7%
Depreciation expense ratio	6.8%	6.4%	7.0%	7.1%	6.8%
Interest expense ratio	4.4%	3.8%	4.4%	4.7%	4.8%
Net farm income ratio	8.0%	11.0%	5.6%	7.6%	7.8%



**Financial Summary**  
**(Farms Sorted by Region)**

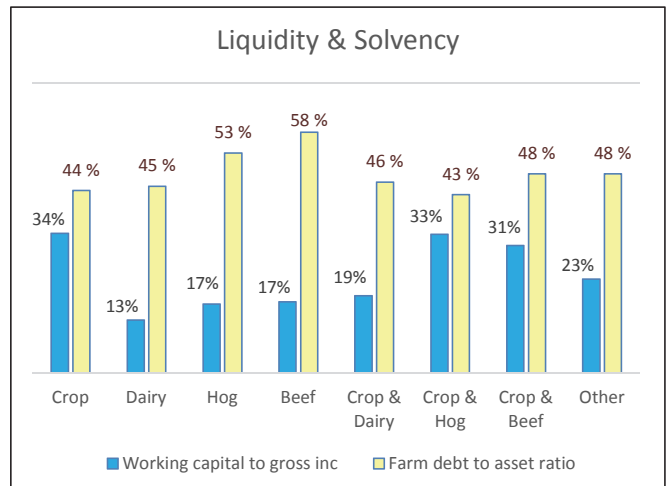
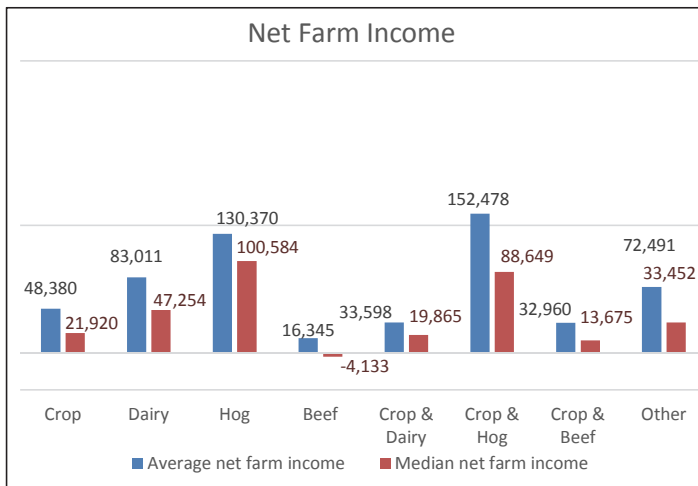
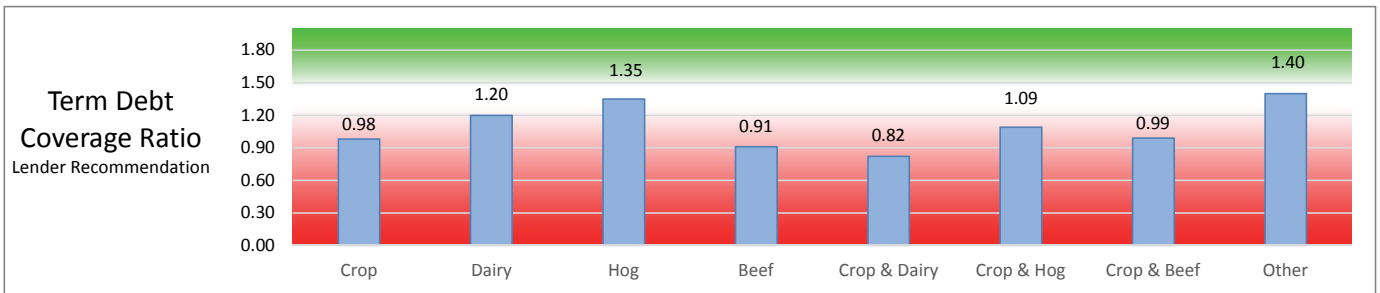
**Minnesota State - Farm Business Management**

	<u>State Ave.</u>	<u>Northern</u>	<u>Southern</u>	<u>Red River Valley</u>
Number of farms	2164	622	1420	122
<b>Income Statement</b>				
Gross cash farm income	735,140	562,001	774,349	1,161,505
Total cash farm expense	635,906	470,535	680,554	959,356
Net cash farm income	99,234	91,466	93,795	202,150
Average net farm income	59,543	54,021	54,241	149,404
Median net farm income	<b>26,556</b>	<b>23,489</b>	<b>25,337</b>	<b>79,377</b>
<b>Profitability (cost)</b>				
Rate of return on assets	2.2%	2.5%	1.9%	3.5%
Rate of return on equity	0.6%	1.2%	0.0%	3.3%
Operating profit margin	6.8%	8.4%	5.8%	9.5%
Asset turnover rate	32.1%	30.10%	32.2%	36.60%
<b>Liquidity &amp; Repayment (end of year)</b>				
Current ratio	1.57	1.57	1.57	1.61
Working capital	192,178	135,504	203,059	354,472
Working capital to gross inc	25.5%	23.6%	25.6%	29.9%
Term debt coverage ratio	1.10	1.18	1.02	1.51
<b>Solvency (end of year at market)</b>				
Total assets	2,955,907	2,231,661	3,103,692	4,928,259
Total liabilities	1,261,663	973,963	1,323,581	2,007,771
Net worth	1,694,245	1,257,699	1,780,111	2,920,489
Farm debt to asset ratio	45%	46%	45%	42%
<b>Nonfarm Information</b>				
Net nonfarm income	33,090	28,849	35,787	23,333
Farms reporting living expenses	442	76	352	14
Total family living expense	58,933	50,678	59,601	86,949
Total living, invest, & capital	84,694	65,631	87,463	118,550
<b>Total crop acres</b>	<b>788</b>	<b>755</b>	<b>699</b>	<b>1,982</b>
<b>Machinery value per crop acre</b>	<b>730</b>	<b>596</b>	<b>851</b>	<b>492</b>



**Financial Summary**  
(Farms Sorted by Farm Type)  
Minnesota State - Farm Business Management

	<u>Crop</u>	<u>Dairy</u>	<u>Hog</u>	<u>Beef</u>	<u>Crop &amp; Dairy</u>	<u>Crop &amp; Hog</u>	<u>Crop &amp; Beef</u>	<u>Other</u>
Number of farms	1089	361	37	57	77	37	107	393
<b>Income Statement</b>								
Gross cash farm income	670,614	1,044,417	1,836,384	497,450	746,454	1,525,332	508,676	553,788
Total cash farm expense	574,254	916,104	1,755,038	519,795	657,675	1,276,356	449,708	454,023
Net cash farm income	96,360	128,313	81,346	-22,345	88,779	248,976	58,968	99,765
Average net farm income	48,380	83,011	130,370	16,345	33,598	152,478	32,960	72,491
Median net farm income	<b>21,920</b>	<b>47,254</b>	<b>100,584</b>	<b>-4,133</b>	<b>19,865</b>	<b>88,649</b>	<b>13,675</b>	<b>33,452</b>
<b>Profitability (cost)</b>								
Rate of return on assets	1.5 %	2.9 %	4.2 %	1.4 %	1.0 %	3.2 %	1.7 %	3.8 %
Rate of return on equity	-0.3 %	2.0 %	4.5 %	-3.1 %	-1.9 %	2.5 %	-0.9 %	3.4 %
Operating profit margin	4.9 %	7.6 %	11.7 %	6.7 %	3.6 %	9.8 %	6.2 %	12.6 %
Asset turnover rate	31.3 %	38.4 %	35.5 %	20.8 %	29.2 %	32.4 %	27.3 %	30.0 %
<b>Liquidity</b>								
Current ratio	1.57	1.65	1.50	1.27	1.55	1.96	1.60	1.53
Working capital	230,333	136,311	321,051	94,515	141,315	511,950	157,796	130,521
Working capital to gross inc	34%	13%	17%	17%	19%	33%	31%	23%
Term debt coverage ratio	0.98	1.20	1.35	0.91	0.82	1.09	0.99	1.40
<b>Solvency (end of year at market)</b>								
Number of farms	1,089	361	37	57	77	37	107	393
Total assets	3,357,306	2,604,507	3,604,265	1,733,323	3,012,738	5,252,385	2,147,371	2,305,991
Total liabilities	1,372,715	1,143,576	1,796,492	931,094	1,343,370	2,149,607	979,254	1,052,976
Net worth	1,984,591	1,460,931	1,807,773	802,229	1,669,368	3,102,778	1,168,118	1,253,016
Farm debt to asset ratio	44 %	45 %	53 %	58 %	46 %	43 %	48 %	48 %
<b>Total crop acres</b>	1,102	375	521	308	663	1,083	560	457
<b>Machinery value per crop acre</b>	625	1,301	959	817	997	827	702	877



**Financial Summary**  
**(Sorted by Number of Years Farming)**  
**Minnesota State - Farm Business Management**

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Number of farms	523	346	332	492	471
<b>Income Statement</b>					
Gross cash farm income	339,176	630,612	833,865	922,102	986,720
Total cash farm expense	298,175	540,452	731,355	791,303	851,440
Net cash farm income	41,002	90,160	102,510	130,799	135,281
Average net farm income	40,283	68,113	59,261	73,596	60,151
Median net farm income	<b>22,002</b>	<b>31,481</b>	<b>30,729</b>	<b>33,299</b>	<b>24,006</b>
<b>Profitability (cost)</b>					
Rate of return on assets	3.3 %	3.6 %	1.9 %	2.1 %	1.4 %
Rate of return on equity	2.9 %	3.1 %	-0.1 %	0.6 %	-0.4 %
Operating profit margin	9.2 %	9.9 %	5.9 %	7.0 %	4.6 %
Asset turnover rate	35.7 %	36.3 %	32.4 %	30.0 %	31.0 %
<b>Liquidity &amp; Repayment (end of year)</b>					
Current ratio	1.58	1.44	1.47	1.58	1.68
Working capital	84,072	125,524	193,931	248,668	300,938
Working capital to gross inc	23.2 %	19.2 %	22.7 %	26.4 %	30.3 %
Term debt coverage ratio	1.48	1.37	0.98	1.05	0.91
<b>Solvency (end of year at market)</b>					
Number of farms	523	346	332	492	471
Total assets	1,147,176	2,144,269	3,358,768	4,004,703	4,181,038
Total liabilities	637,519	1,075,637	1,486,213	1,609,404	1,569,844
Net worth	509,657	1,068,632	1,872,556	2,395,299	2,611,194
Farm debt to asset ratio	59 %	53 %	47 %	43 %	40 %
<b>Total crop acres</b>					
	394	686	900	988	1,011
<b>Machinery value per crop acre</b>					
	472	583	766	796	824

