
2015 Moorhead Averages and Comparisons

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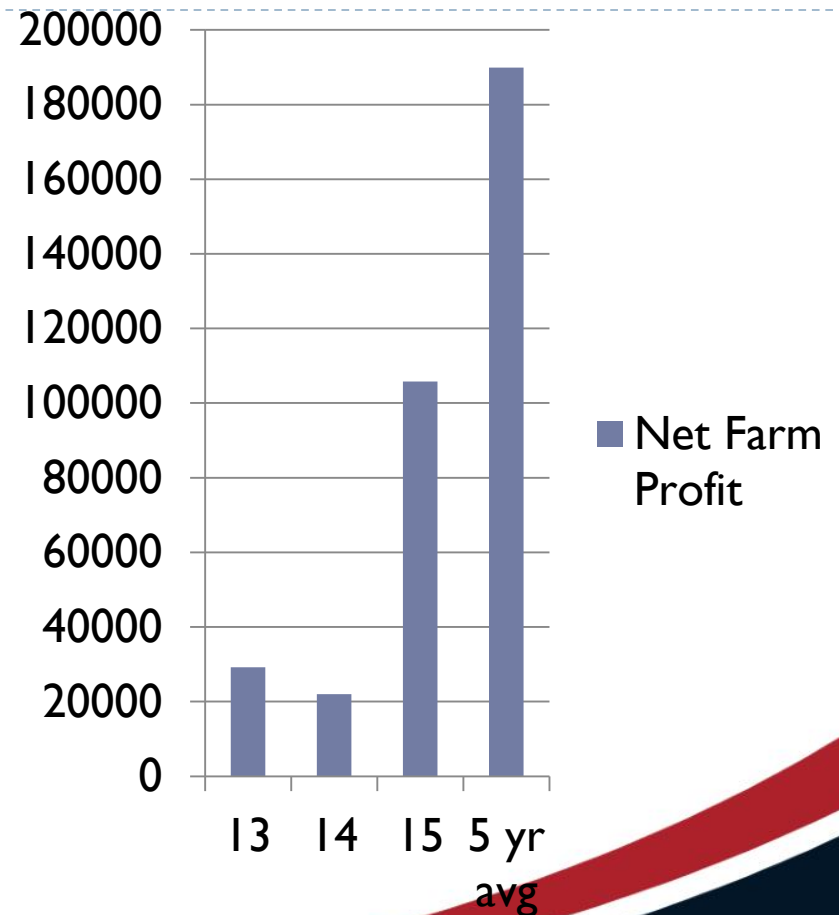
Net Farm Income back up with excellent yields

Net Farm Profit

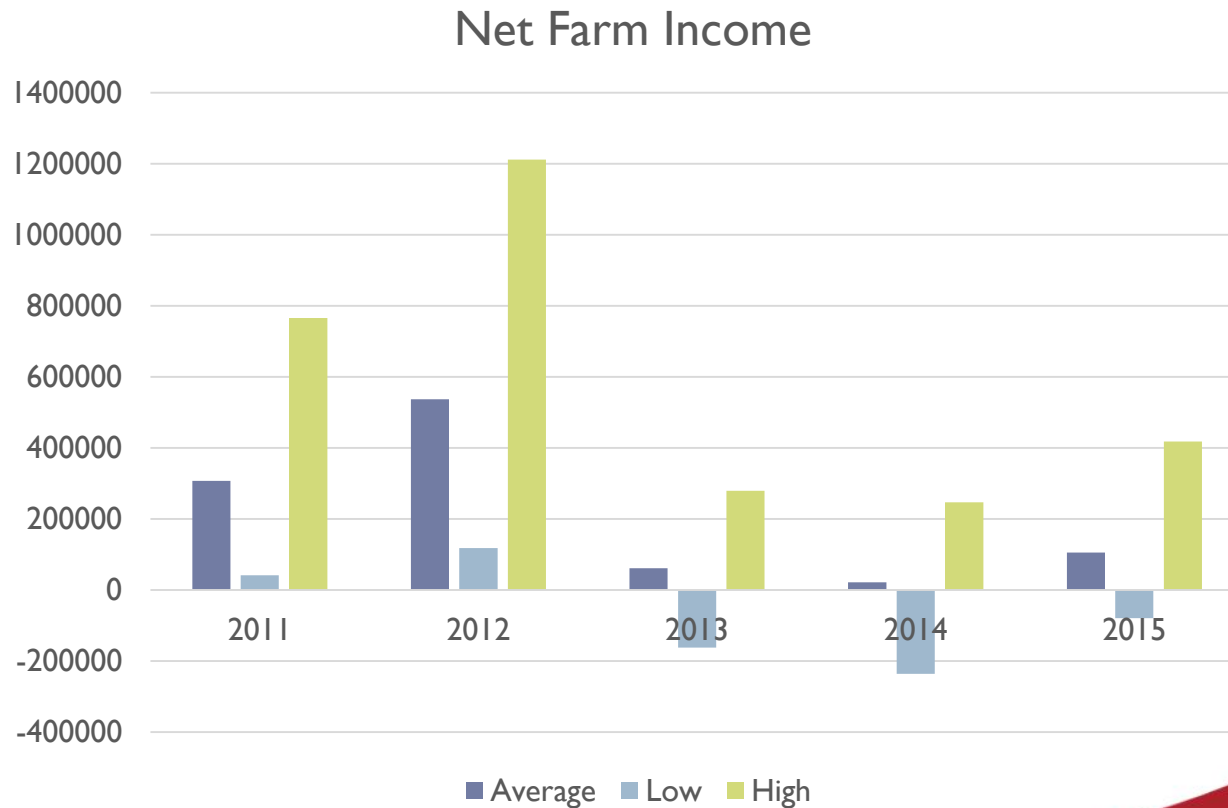
▶ Net Farm Income or Profit

(Net Cash Income +Inventory Changes-Depreciation) per farm was **\$105,808** (**\$89,489-Vly**) (**State Average \$44,225**) down **44%** from 5 year average of **\$189,931**.

▶ Reasons-Lower Sale prices of 2014 inventory, historically good yields, lower inputs (fuel) significantly lower sale prices for 2015.

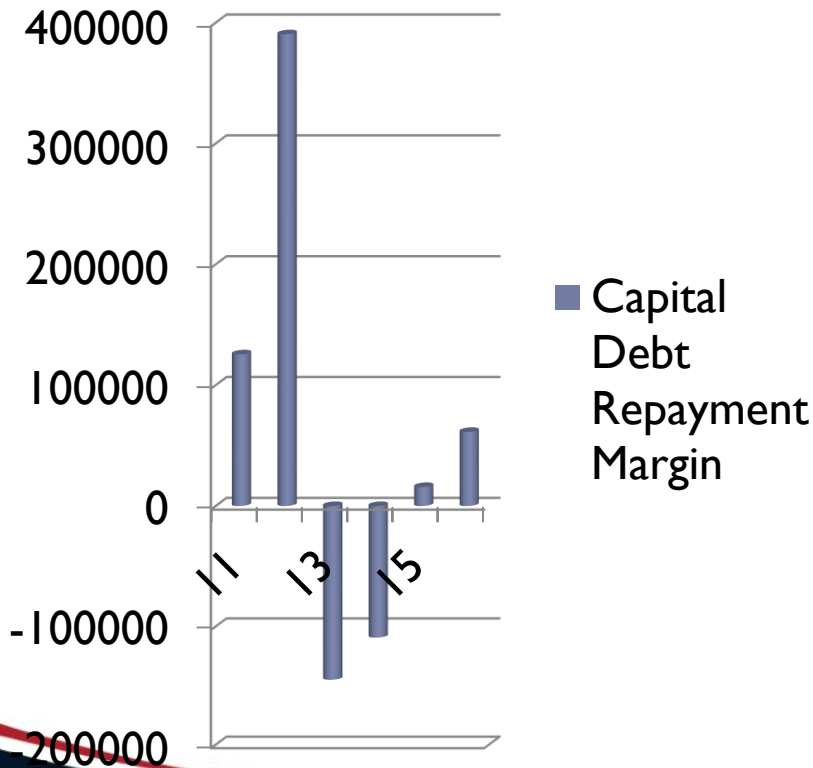


Net Farm Income (Profit) By Year (Before Living and Taxes)



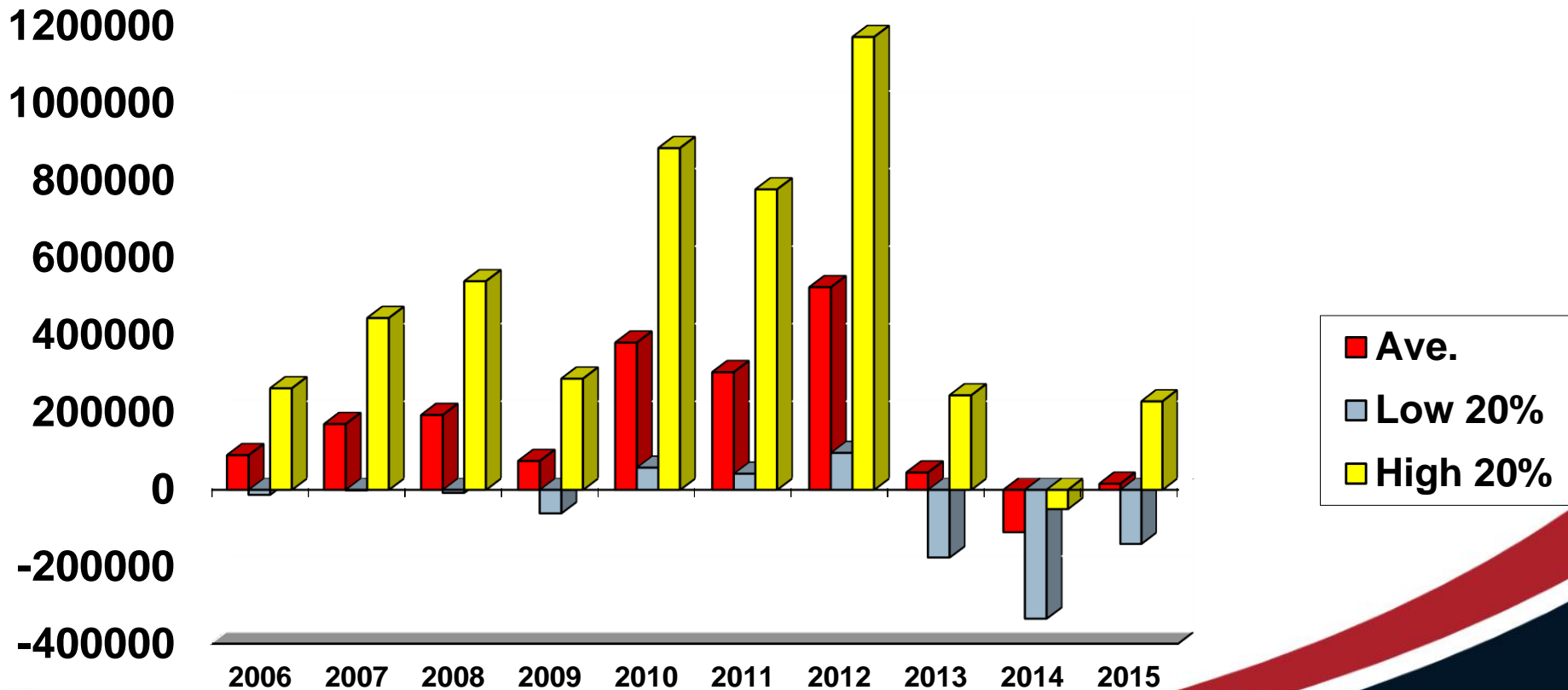
Similar to last year

Capital Debt Repayment Margin

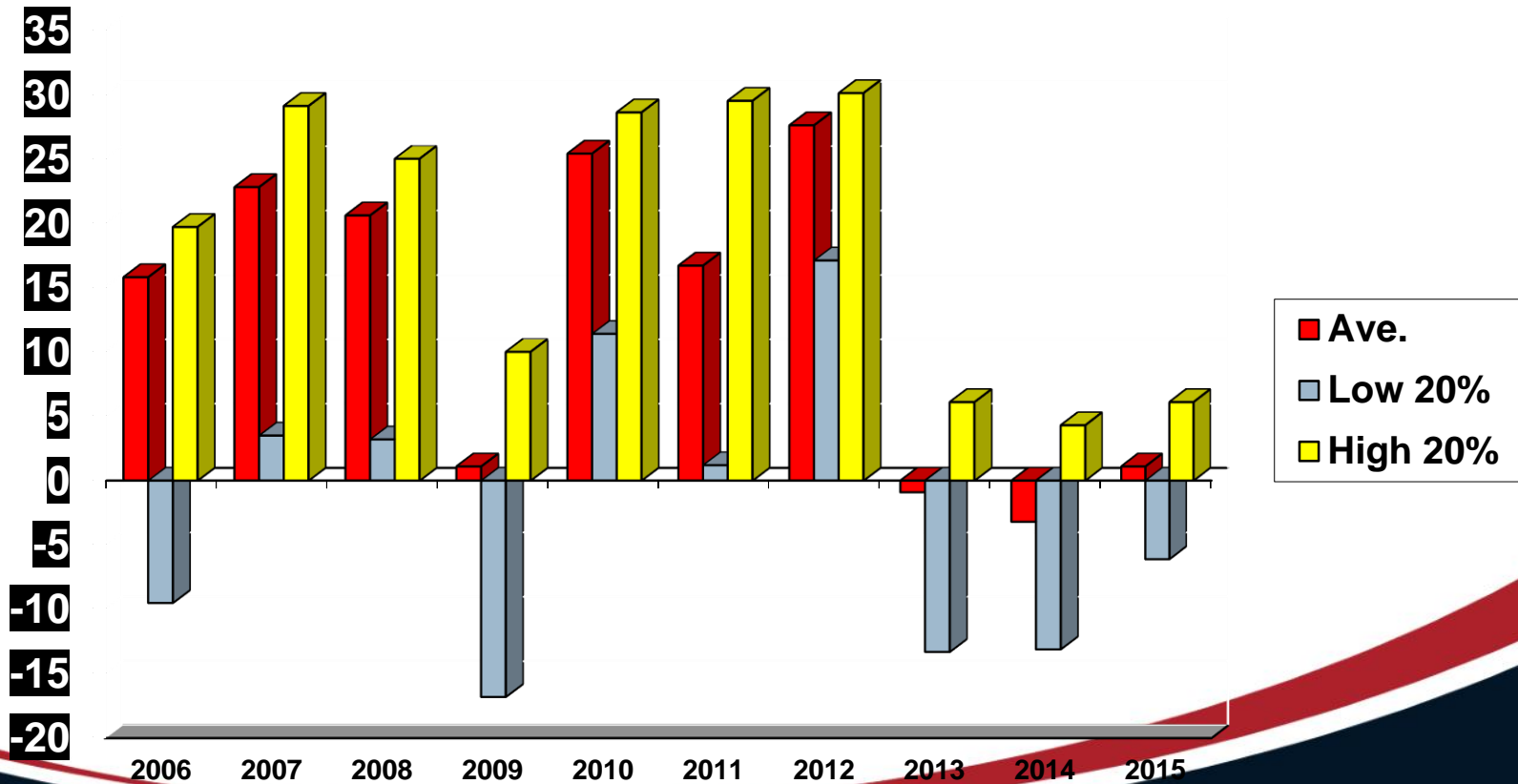


- ▶ Capital Debt Repayment Margin-Money left after paying all expenses to reinvest in the business was **\$15,738**(-1,834 Valley)
- ▶ This was third positive CDRM since 2011 the 5 year average is now **\$61,310**.

Capital Replacement Dollars/Year increased for each group



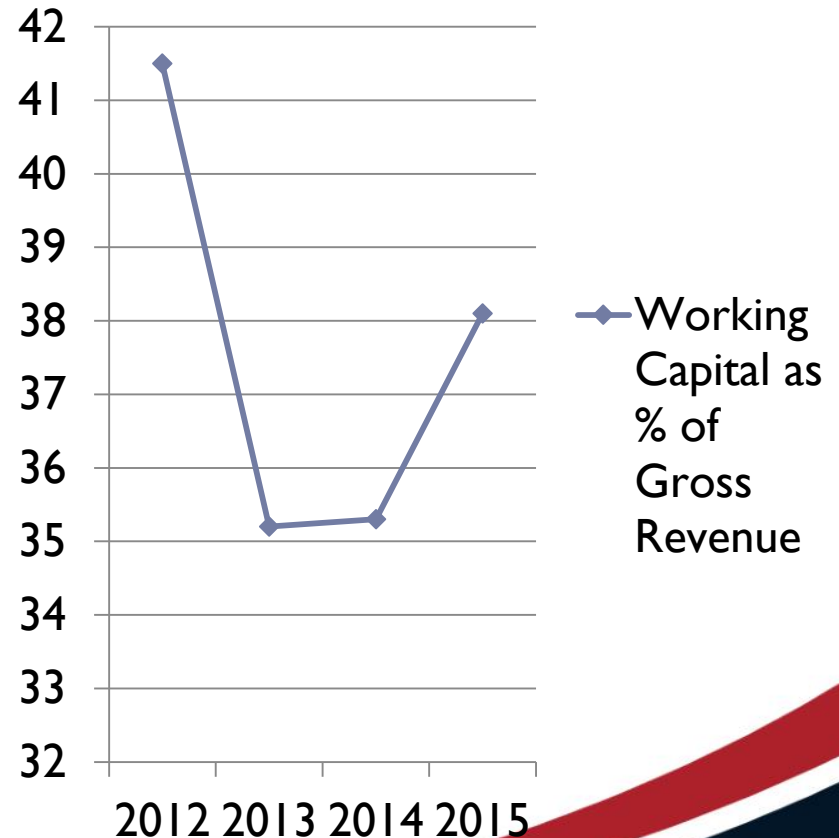
Rate of Return on Equity/Year (Cost)



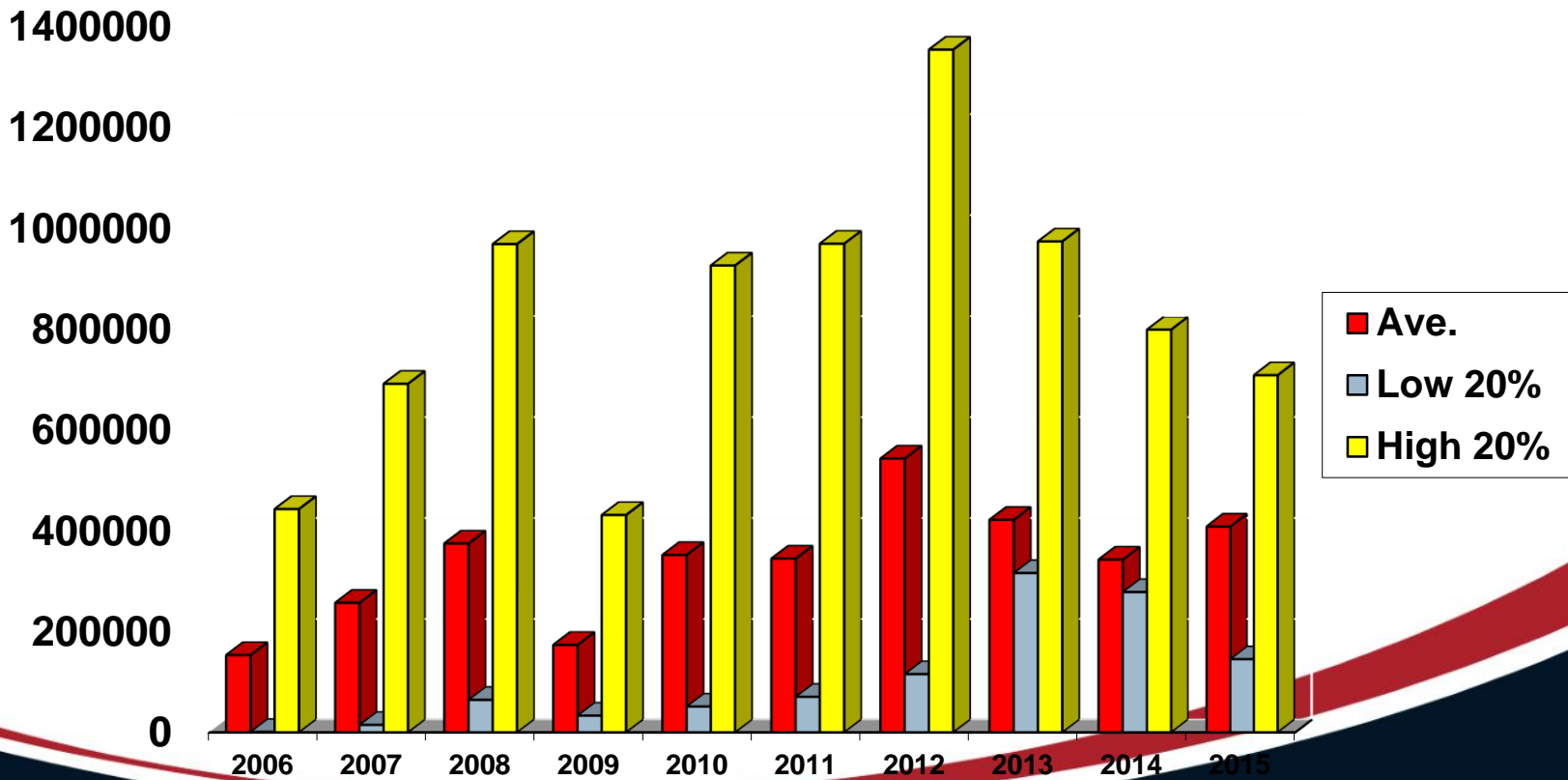
Working Capital is on the increase

- ▶ Working capital as a percentage of gross revenue was **38.1% (35.9% Vly)** which still gives good financial support for unknown future prices/production, it was **2.4%** lower than 5 year average.
- ▶ Rates of return on assets
- ▶ **(2.6%), (2.2% Valley)** and Rate of return on equity
- ▶ **(1.5%) (1.3% Valley)** are

Working Capital as % of Gross Revenue

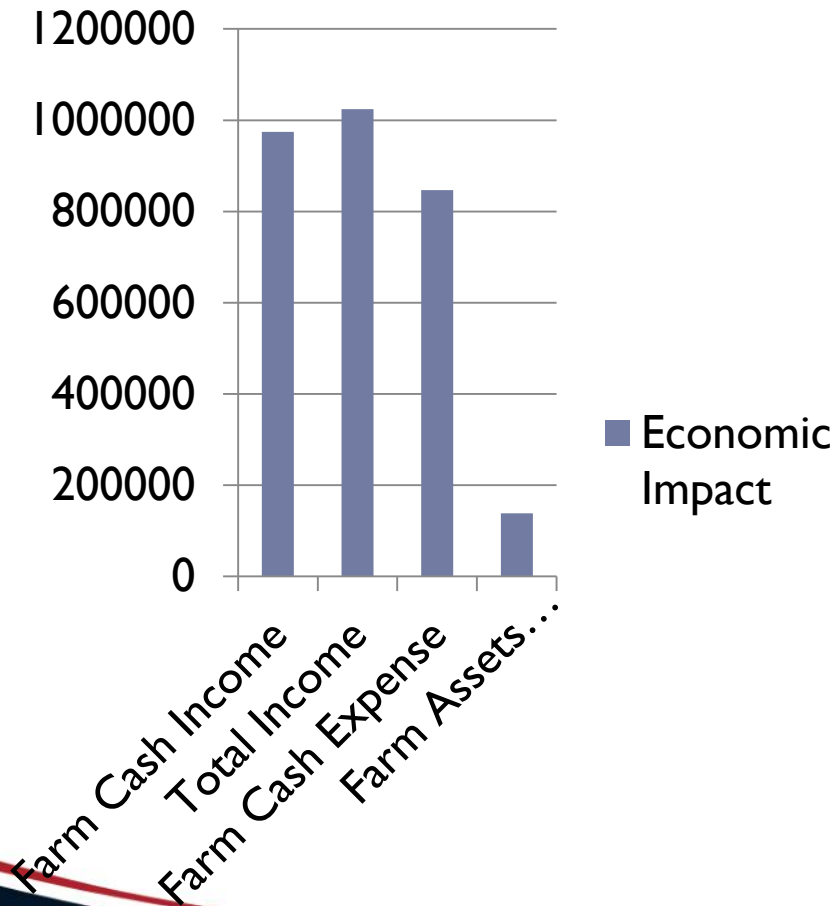


Average Working Capital increased by \$65,442 and the low 20% decreased after last year where high profit farms slipped into the low 20%



Economic Impact of Moorhead FBM Farms

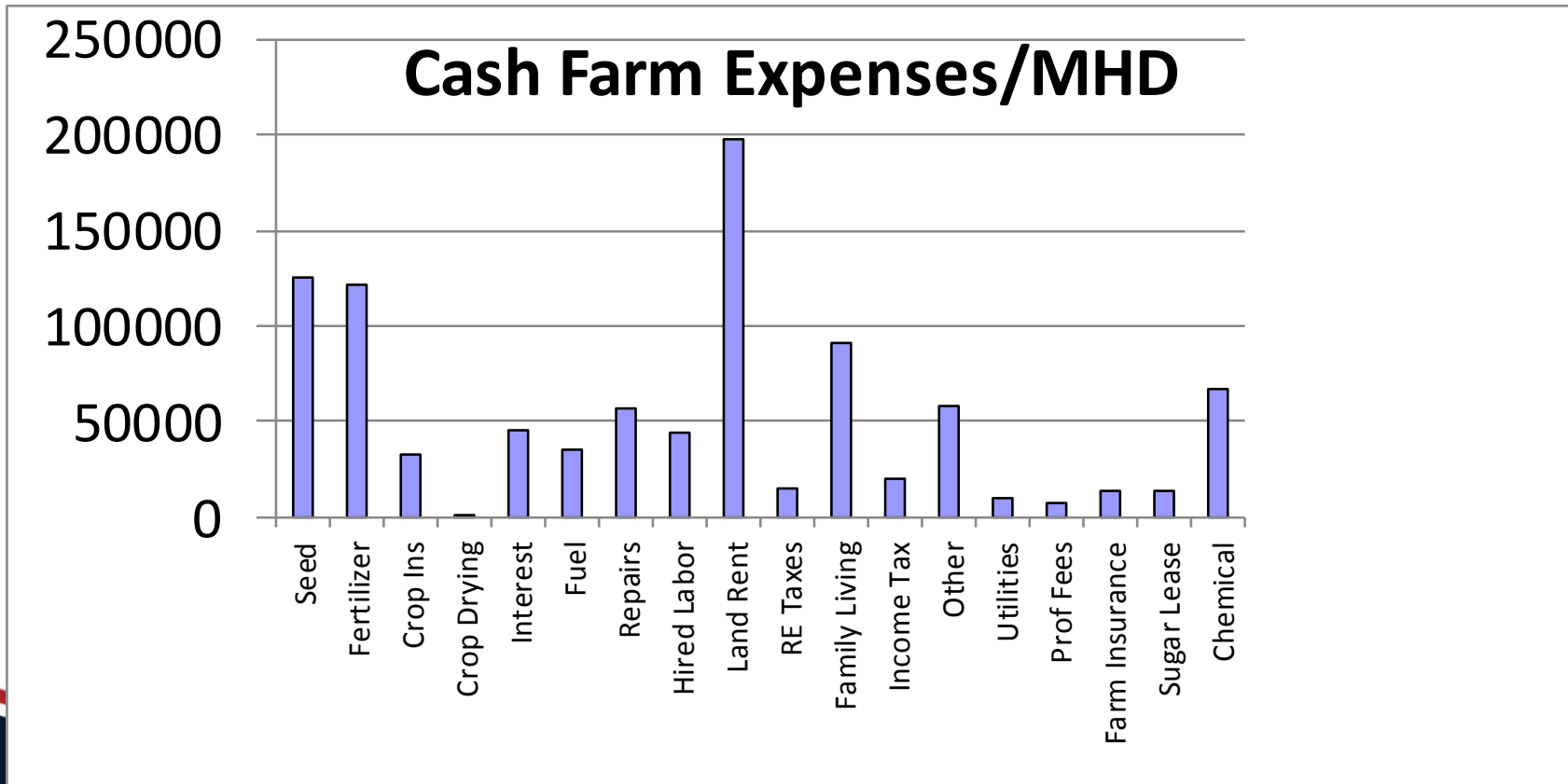
Economic Impact



- ▶ Out of the 64 Farms analyzed, number are average per farm:
- ▶ Farm Cash Income : **\$974,281**
- ▶ Total Income: **\$1,024,263**
- ▶ Farm Cash Expense: **\$846,508**
- ▶ Farm Assets Purchased: **\$137,892**

How the \$957,989

was spent including family living and income taxes. The three largest expense are Land Rent, Seed and Fertilizer.



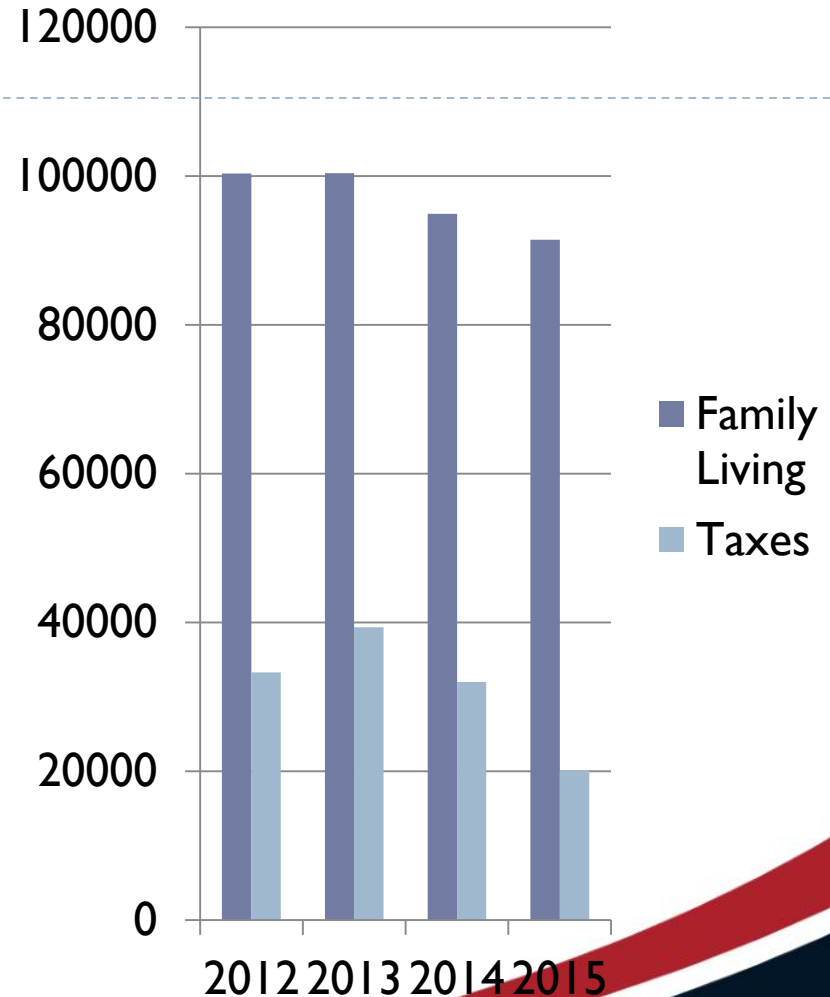
Economic Impact of Moorhead FBM Farms

▶ Family Living and Income Taxes Paid: \$111,481, lower due to taxes paid in 2015, FL slightly lower.

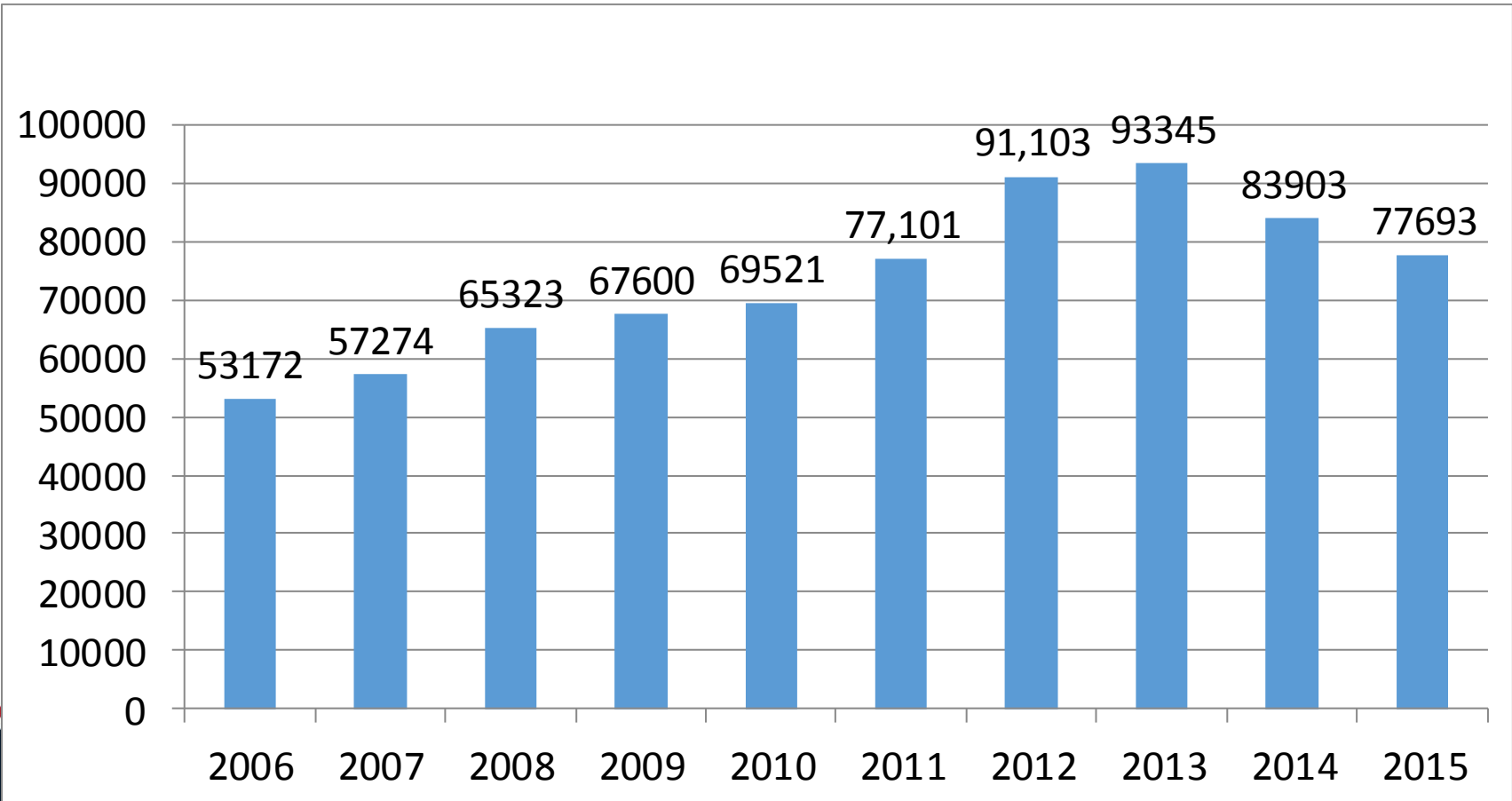
▶ Dollars spent in area on all expenses: \$1,132,748 (Total \$72,495,872)

▶ Inventory Change:

▶ **+62,519**



RRV Apparent Family Living



Economic Impact of Moorhead FBM Farms



- ▶ Money borrowed:
\$592,278
- ▶ Principal Payments:
\$501,622

Economic Impact of Moorhead FBM Farms

Farm Financial Scorecard

	This Year	5-Year Ave	Strong	Vulnerable
Liquidity			1.7	1.1
Current ratio	1.88	1.92		
Working capital	\$407,578	\$424,344		
Working cap to gross revenue	38.1%	37.2%	25%	10%
Solvency (market)	Note: These solvency ratios include deferred liabilities			
			30%	60%
Farm debt/asset ratio	41%	36%		
			70%	40%
Farm equity/asset ratio	59%	64%		
			0.43	1.50
Farm debt/equity ratio	0.71	0.58		

Economic Impact of Moorhead Farms

Profitability (Cost)					
Rate of return on farm assets	2.6%	5.9%	8%	4%	
Rate of return on farm equity	1.5%	7.2%	10%	3%	
Operating profit margin	7.0%	11.0%	25%	15%	
Net farm income	\$105,808	\$189,931			
EBITDA	\$240,523	\$300,789			
Repayment Capacity (Accrual)					
Capital debt repay capacity	\$131,631	\$174,881			
Capital debt repay margin	\$15,738	\$61,310			
Replacement margin	-\$34,581	\$26,735			
Term-debt coverage ratio	1.14	1.63	1.50	1.20	
Replacement margin ratio	0.79	1.28	1.40	1.10	

Economic Impact of Moorhead Farms

Financial Efficiency					
Asset-turnover rate (market)	37.6%	42.9%	45%	30%	
Operating-expense ratio	77.5%	75.1%	60%	80%	
Depreciation-expense ratio	7.9%	6.9%	5%	15%	
Interest-expense ratio	4.7%	3.9%	5%	10%	
Net farm income ratio	9.9%	14.7%	20%	10%	

Developed by: University of Vermont Extension and Center for Farm Financial Mgt, University of Minnesota

Updated by: Greg Tullis, Farm Business Mgt Program, Northland College

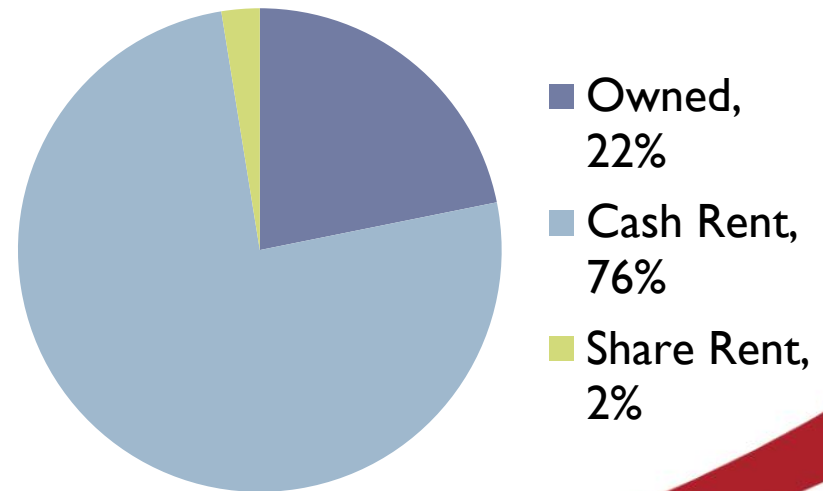
Conclusions about the ratios

- ▶ Start to compare your information to the last 3 to 5 years of data.
- ▶ Determine your own trend lines.
- ▶ Compare your data to the area averages.
- ▶ How does your business stack up?
- ▶ Evaluate possible changes if needed.

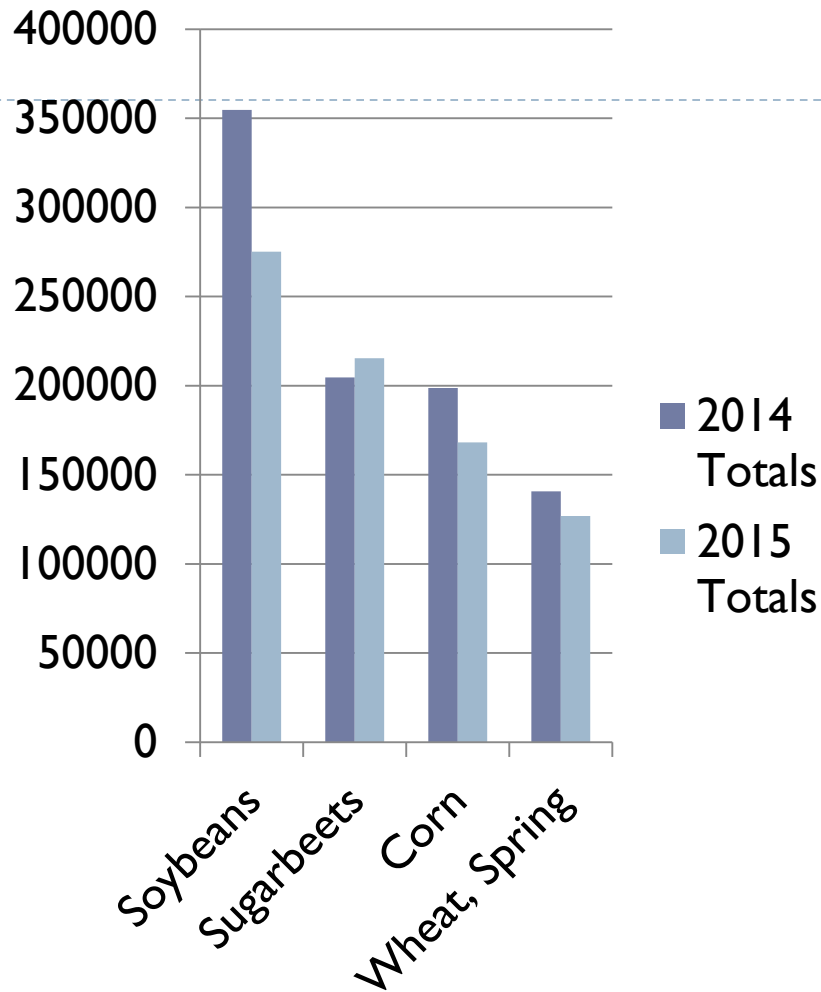
Whole Farm Data

- ▶ **64** Farms completed the FINAN, mostly in Clay and Norman counties, (Valley had 266 Farms, up 35 from 2014)
- ▶ Average farmer age was **47.3** with **24.7** years of farming. (Valley was 47.5 and 24.1 years)
- ▶ Average acres was **1850.8** with **404.1** owned, **1,400** cash rented and **47** share rented.
- ▶ Valley #'s (1,533 Total, 368 own, 1121 Rent, 45 share)

Crop Acres



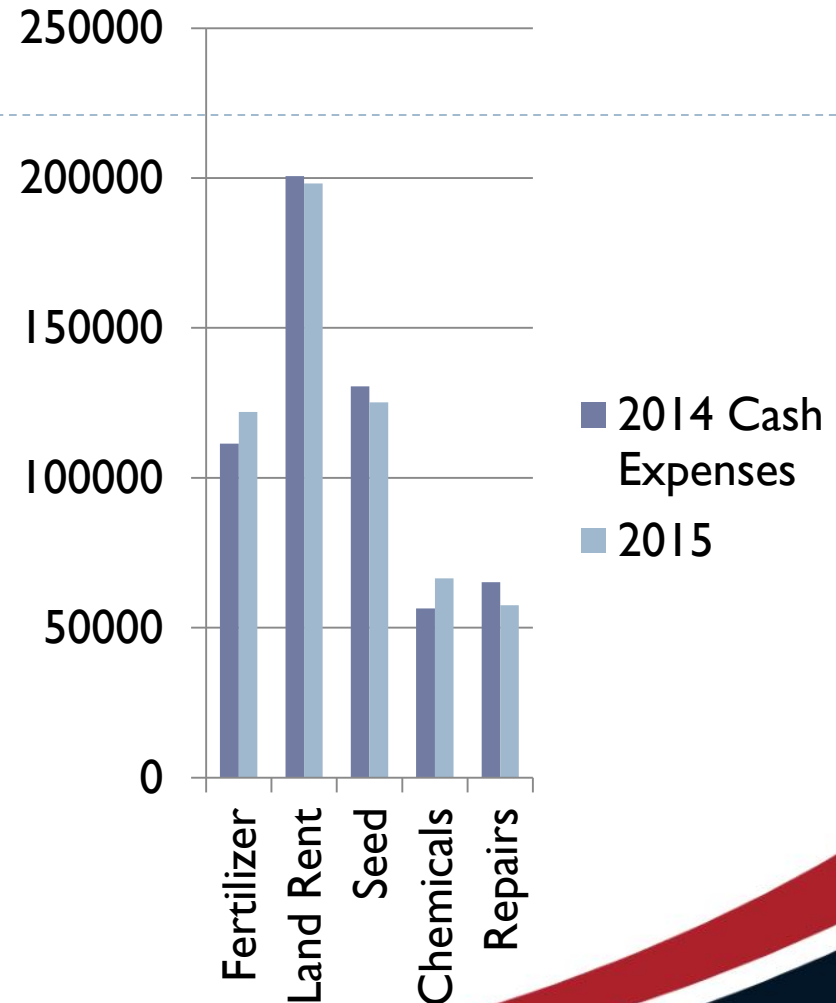
Whole Farm Data



- ▶ **Average Crop Income:**
Doesn't include inventory value of crops
- ▶ **Soybeans- \$275,207** down **22.4%** from 2014 (**\$354,644**).
- ▶ **Sugarbeets-\$215,388** up **5.3%** from (**\$204,625**) in 2014.
- ▶ **Corn- \$168,160** down **15.4%** from 2014 (**\$198,756**).

Whole Farm Data

- ▶ Wheat- **\$126,905** down **9.9%** from 2014 (**\$140,778**).
- ▶ Average Crop Expenses-Includes prepaids for 2016!
- ▶ Land Rent-**\$198,206** down **1.2%** from 2014 (**\$200,671**)
- ▶ Seed-**\$125,149** down **4.1%** from 2014 (**\$130,552**)



Whole Farm Data

- ▶ Fertilizer- **\$121,971** up **9.5%** from 2014 (**\$111,387**)
- ▶ Repairs-**\$57,480** down **11.8%** from 2014 (**\$65,143**)
- ▶ Chemicals-**\$66,485** up **17.8%** from 2014 (**\$56,455**).

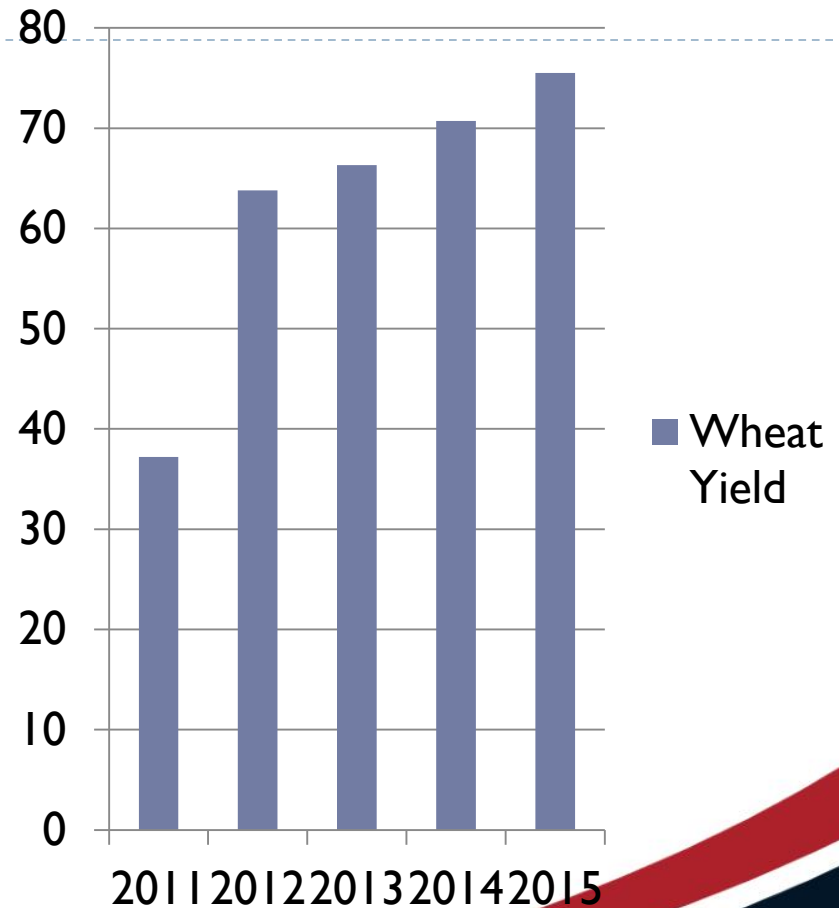
Comparison to Valley

- ▶ **Income:** Soybeans is #1 in crop income (\$241,502), followed by Corn (\$200,542), Sugarbeets (\$144,206) then Spring Wheat (\$95,454).
- ▶ **Expenses:** Land Rent is #1 at \$156,283 followed by Fertilizer (\$109,225), Seed (\$108,159), Chemicals (\$62,040) and Repairs(\$54,828).

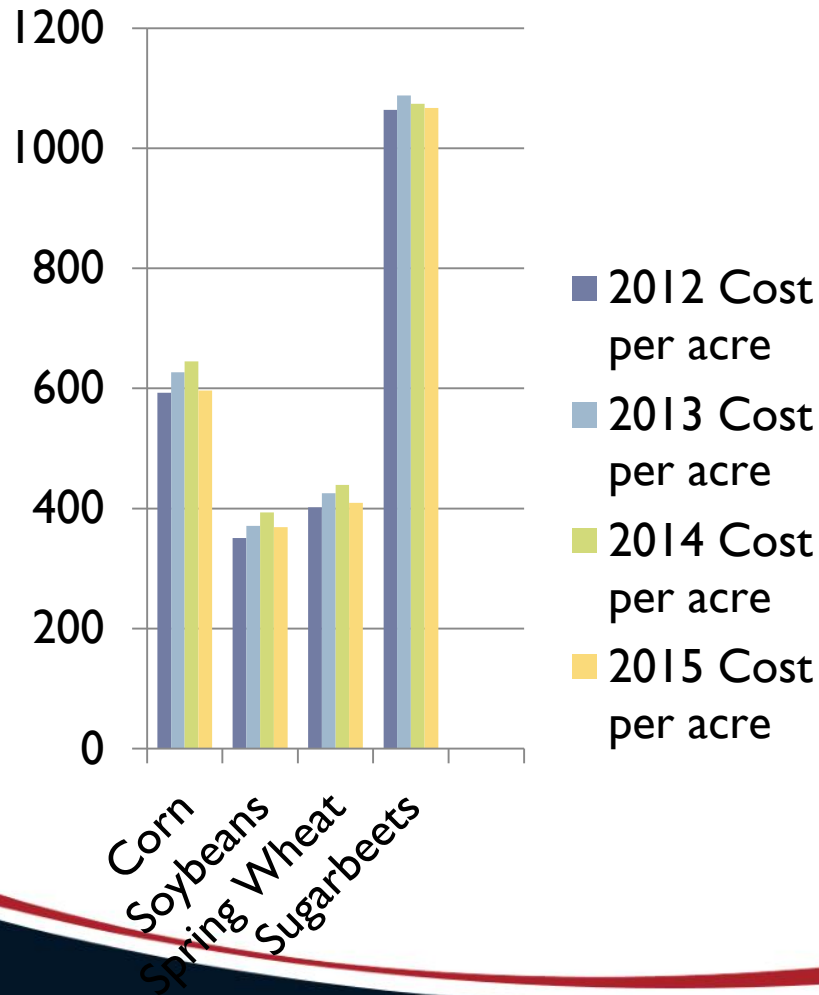
Production Data

- ▶ Average Crop Yields in 2015
(Valley #)-Record Setting
Yields for Many!!
- ▶ Corn- **158.54** bu/acre
(167.5)
- ▶ Soybeans- **44.61** bu/acre
(41.9)
- ▶ Sugarbeets- **28.69** ton/acre
(26.6)
- ▶ Wheat, Spring- **75.5** bu/acre
(71.4)

Wheat Yield

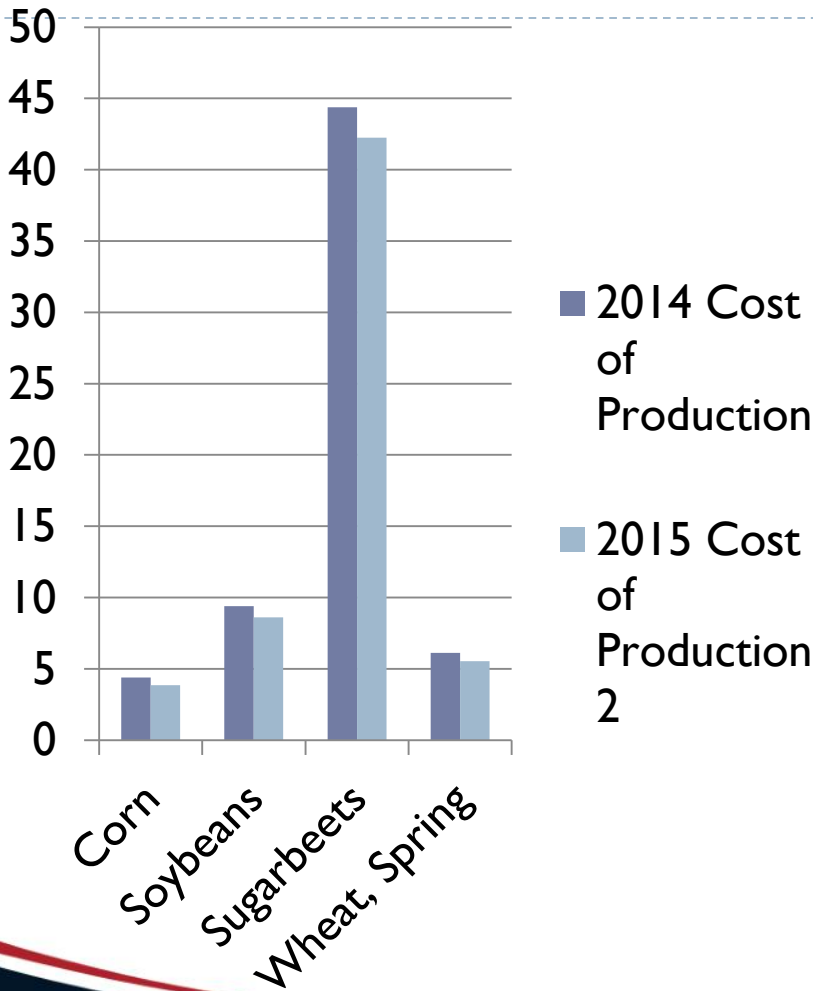


Production Data



- ▶ Total costs per acre and per bushel-does not personal draw or gvmt. Payments
- ▶ Corn- **\$596.65** and **\$3.76**
- ▶ Soybeans- **\$368.74** and **\$8.27**
- ▶ Sugarbeets-**\$1,066.98** and **\$37.19**
- ▶ Wheat, Spring-**\$409.59** and **\$5.43**

Production Data



- ▶ 2016 Cost of Production Projections-include Family Living, Principal Payments, Operating Interest vs 2015.
- ▶ Corn- **\$3.85** vs **\$4.40** (**\$2.97-\$4.51**)
- ▶ Soybeans- **\$8.60** vs **\$9.39** (**\$7.16-\$11.23**)
- ▶ Sugarbeets- **\$42.26** vs **\$44.38** (**\$32.81-\$52.94**)
- ▶ Wheat, Spring- **\$5.54** vs **\$6.11** (**\$3.78-\$6.71**)

Grain Prices
Prospective Planting Preview

2016 Outlook-Overall Grain

▶ 2016 Price Moving Scenarios

- ▶ 1. Strength/Weakness of US Dollar
- ▶ 2. Price of Crude Oil-typically tied to commodity prices
- ▶ 3. Potential weather issues (winter wheat freeze potential, late/wet plantings in South, Summer Weather (La Nina-Dry))
- ▶ 4. Prospective Planting Reports
- ▶ 5. Export Progress (South American/Brazil Impeachment, Zimbabwe Drought Emergency-Corn), China cancelled some Brazil imports
- ▶ 6. Federal Interest Rates

2016 Outlook-Overall Grain

- ▶ Current USDA Projection before Planting Report
- ▶ Corn-90.2 million acres, 168 bushels, up 2 million acres
- ▶ Soybeans-82.5 million acres, 46.7 bushels, projected ending stocks to be lower in 16-17 than in 15-16, similar acres as last year.
- ▶ Wheat- 51 million acres down, 45.9 bushels, 3.6 from last year

ARC Payments

US Monthly Average Corn Price Received for the 2015/2016 - 2015/2016 Marketing Year(s)

Year	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Avg*
\$/bu.													
2015/2016	3.68	3.67	3.60	3.65									\$3.65

US Monthly Average Soybeans Price Received for the 2015/2016 - 2015/2016 Marketing Year(s)

Year	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Avg*
\$/bu.													
2015/2016	9.05	8.81	8.68	8.76									\$8.82

US Monthly Average Wheat Farm Price Received for the 2015/2016 - 2015/2016 Marketing Year(s)

Year	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Avg*
\$/bu.													
2015/2016	5.43	5.23	4.85	4.72	4.87	4.86	4.71						\$4.95

PLC Prices

Corn \$3.70, Wheat \$5.50, Soybeans \$8.40