



October 16, 2024

Minnesota State

Profitability in production agriculture

Farm Economics – Brief Overview

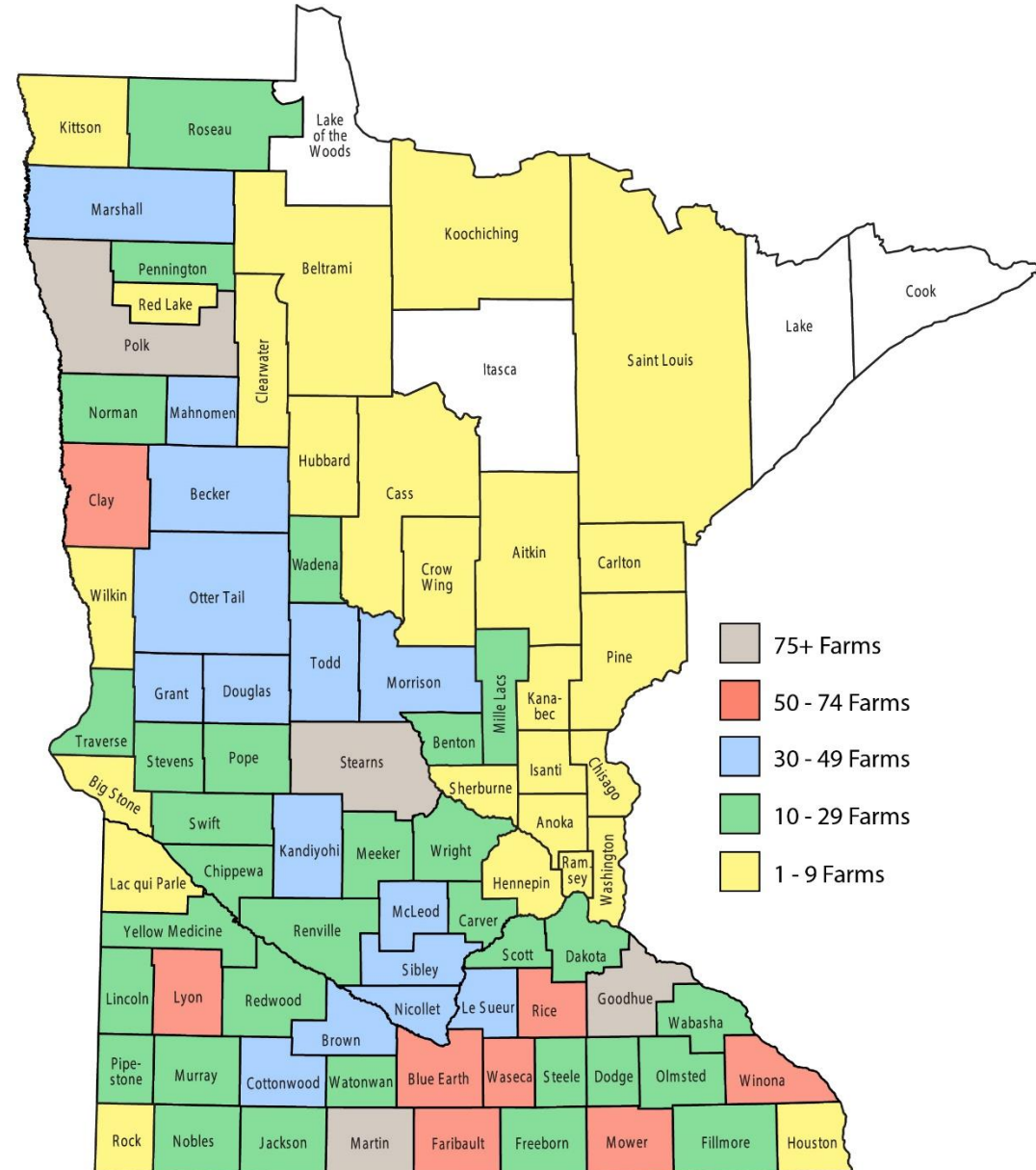
Program Uniqueness – Data Integrity

Farm Business Management

- One-on-one, student-led program, designed to help the farmer-student in financial and business management.
- Classes take place at the farmer-student's site of business, individualized to student goals and timeframe.
- A FINPACK business analysis becomes their textbook and decision-making tool

2023 Farm Business Management Financial Analysis by County

- The 2,317 producers who provided data for three MN regional reports are located in 83 of Minnesota's 87 counties.*



FARM INCOME

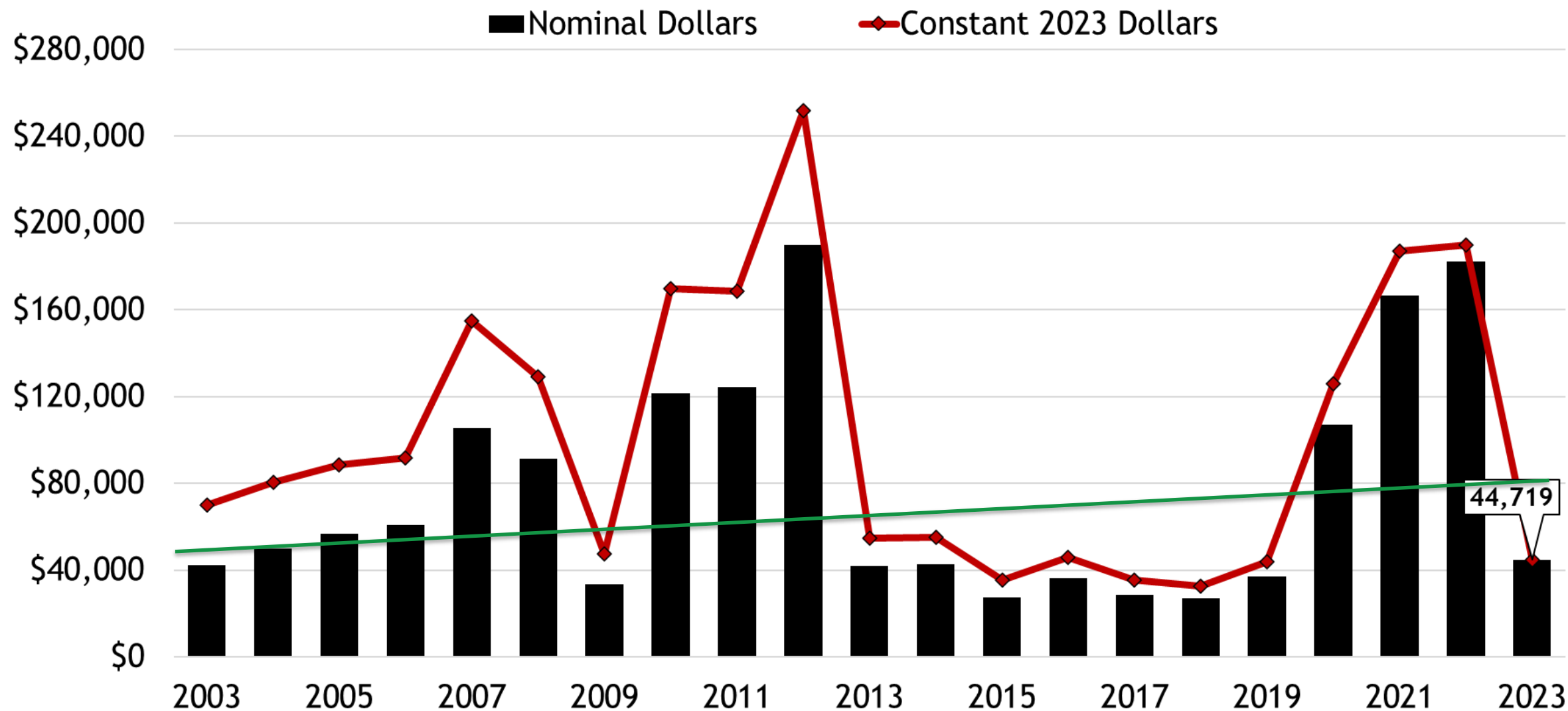


FARM EXPENSES

imgflip.com

Median Net Farm Income

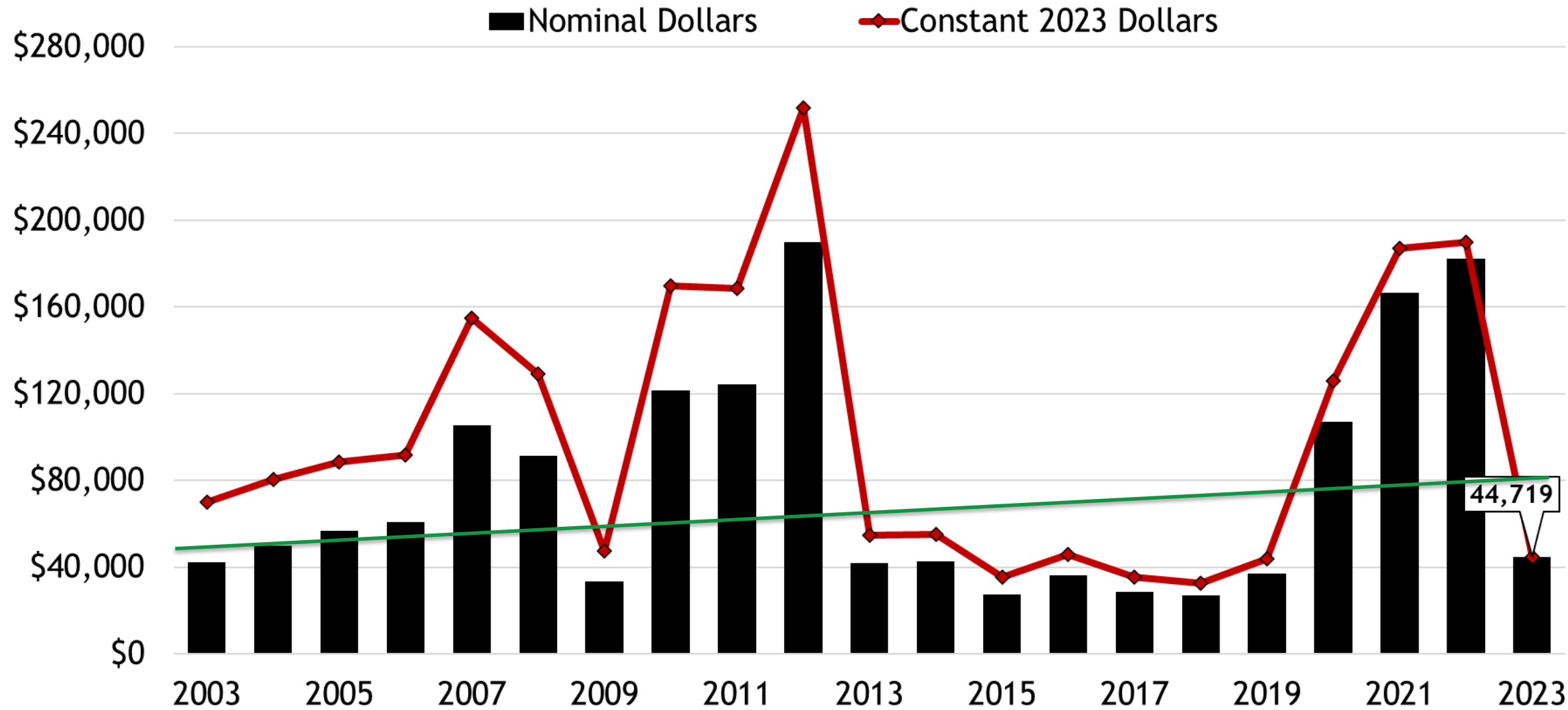
Data: Minnesota, All Farms



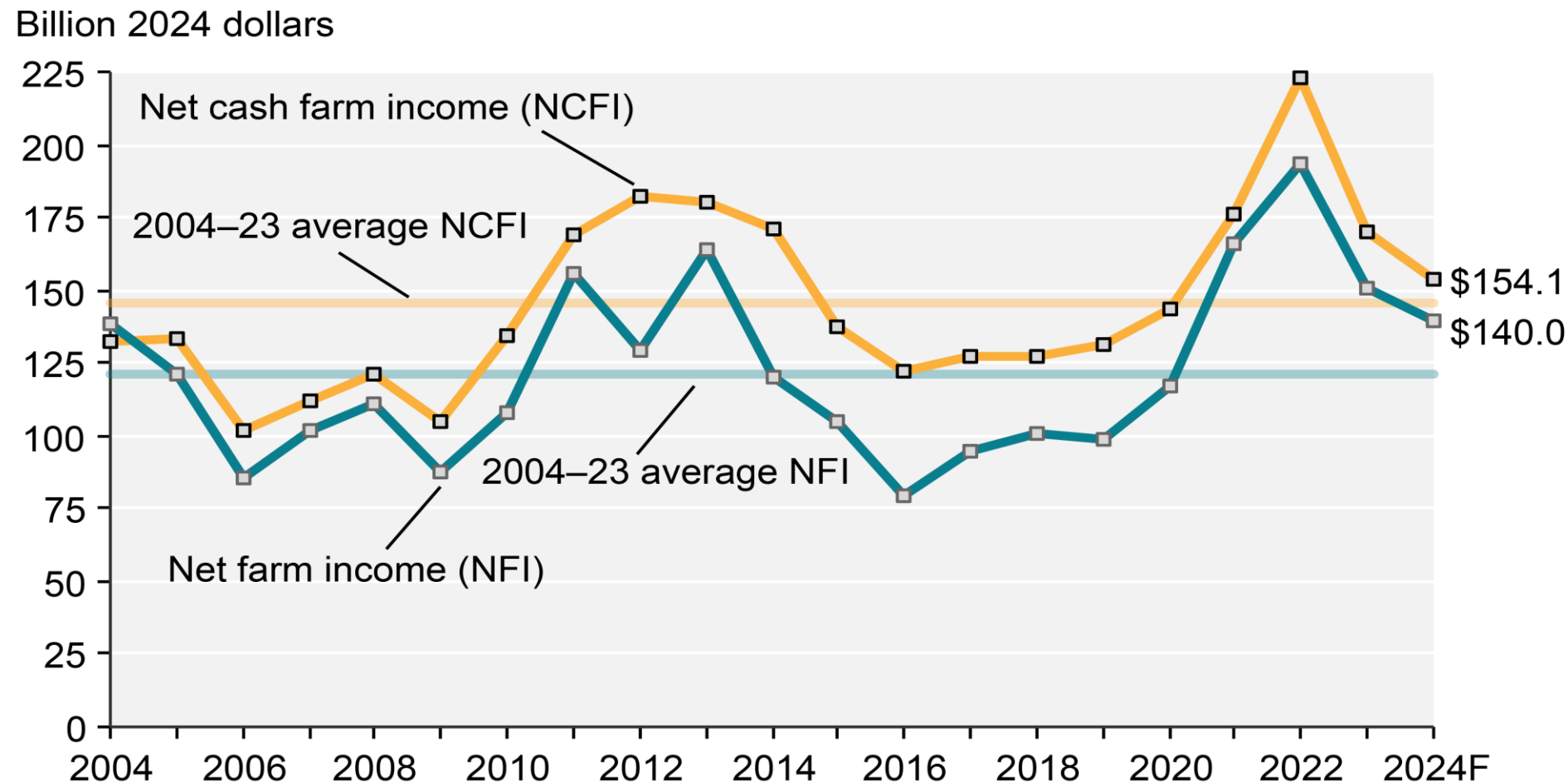


Median Net Farm Income

Data: Minnesota, All Farms



U.S. net farm income and net cash farm income, inflation adjusted, 2004–24F



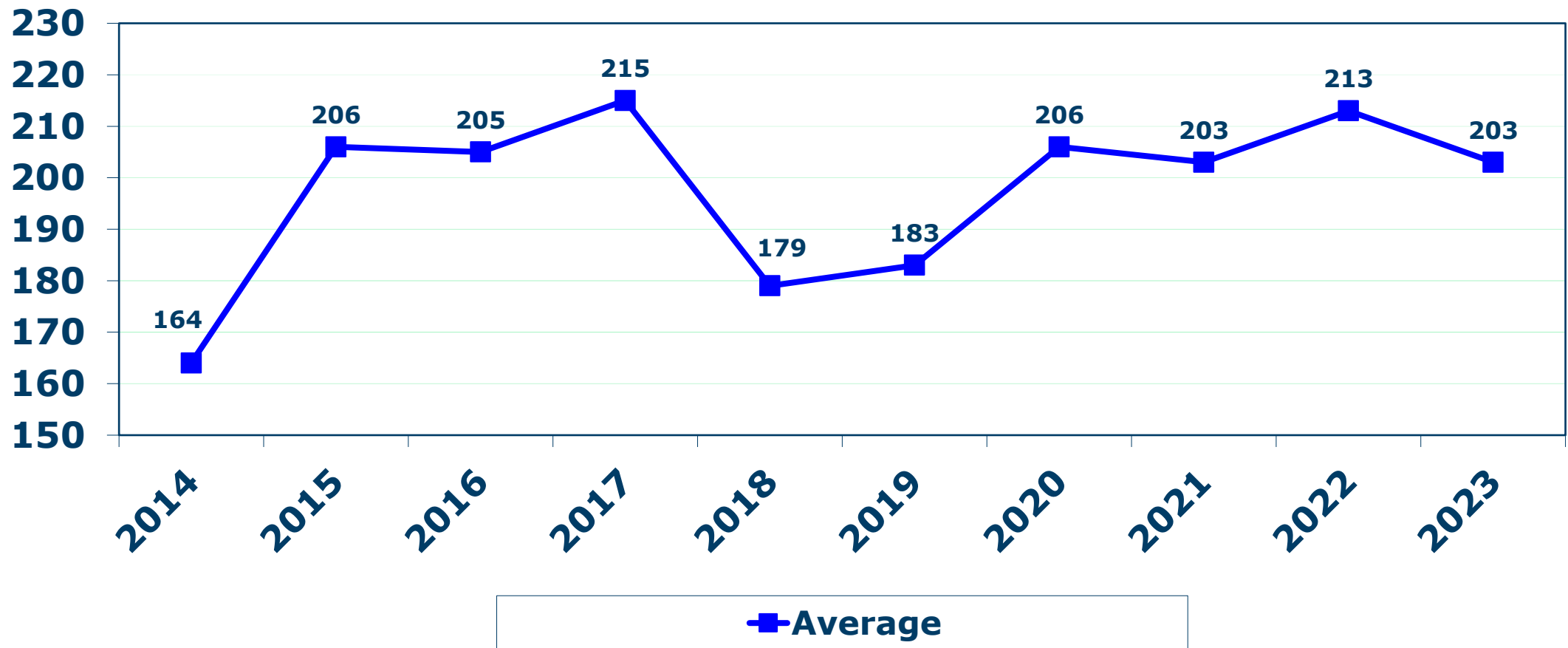
Note: F = forecast. Values are adjusted for inflation using the U.S. Department of Commerce, Bureau of Economic Analysis, Gross Domestic Product Price Index (BEA API series code: A191RG) rebased to 2024 by USDA, Economic Research Service. Source: USDA, Economic Research Service, Farm Income and Wealth Statistics. Data as of September 5, 2024.

What is net farm income used for?

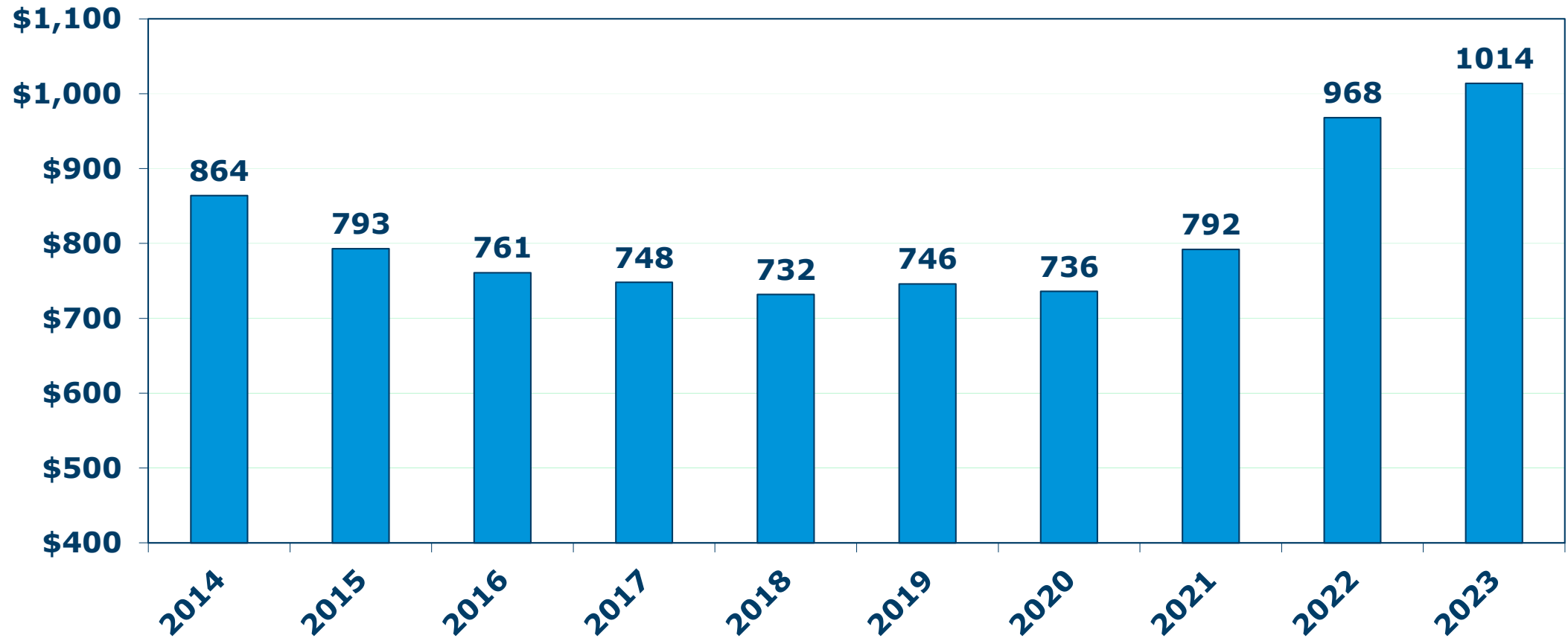
		<u>Northern Minnesota</u>	<u>State Data</u>
Net Farm Income	(+)	\$82,849	\$93,936
Depreciation	(+)	\$61,240	\$66,032
Family Living (Excl Health/Med)	(-)	\$60,554	\$67,223
Social Security and Income Tax	(-)	\$9,835	\$21,360
Health and Medical Expense	(-)	\$8,543	\$10,253
Retirement Accounts	(-)	\$4,746	\$22,731
Principal Payments	(-)	\$80,007	\$80,237
Balance	(=)	-\$19,596	-\$41,836

Crop data.....

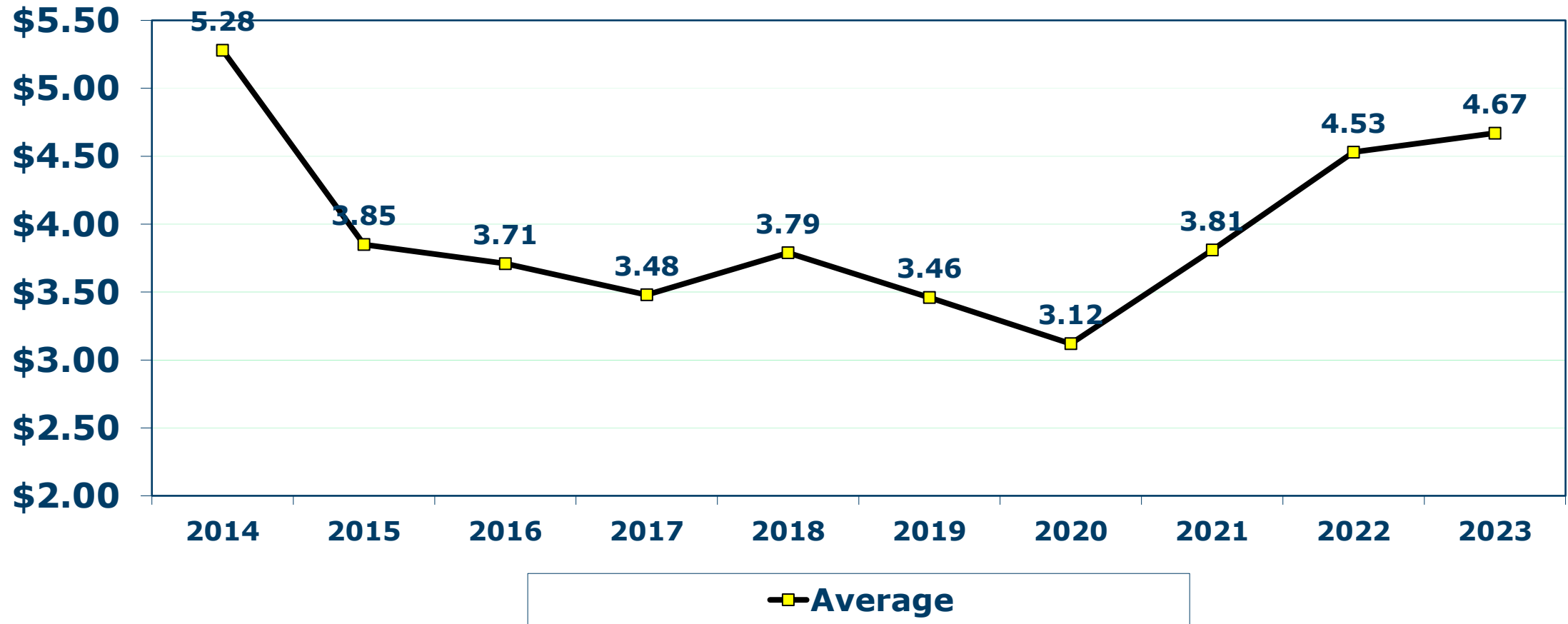
Corn Yields per Acre



Total Listed Costs per Acre for Cash Rented Corn



Total Listed Costs for Corn/bu. (before labor & mgmt.)

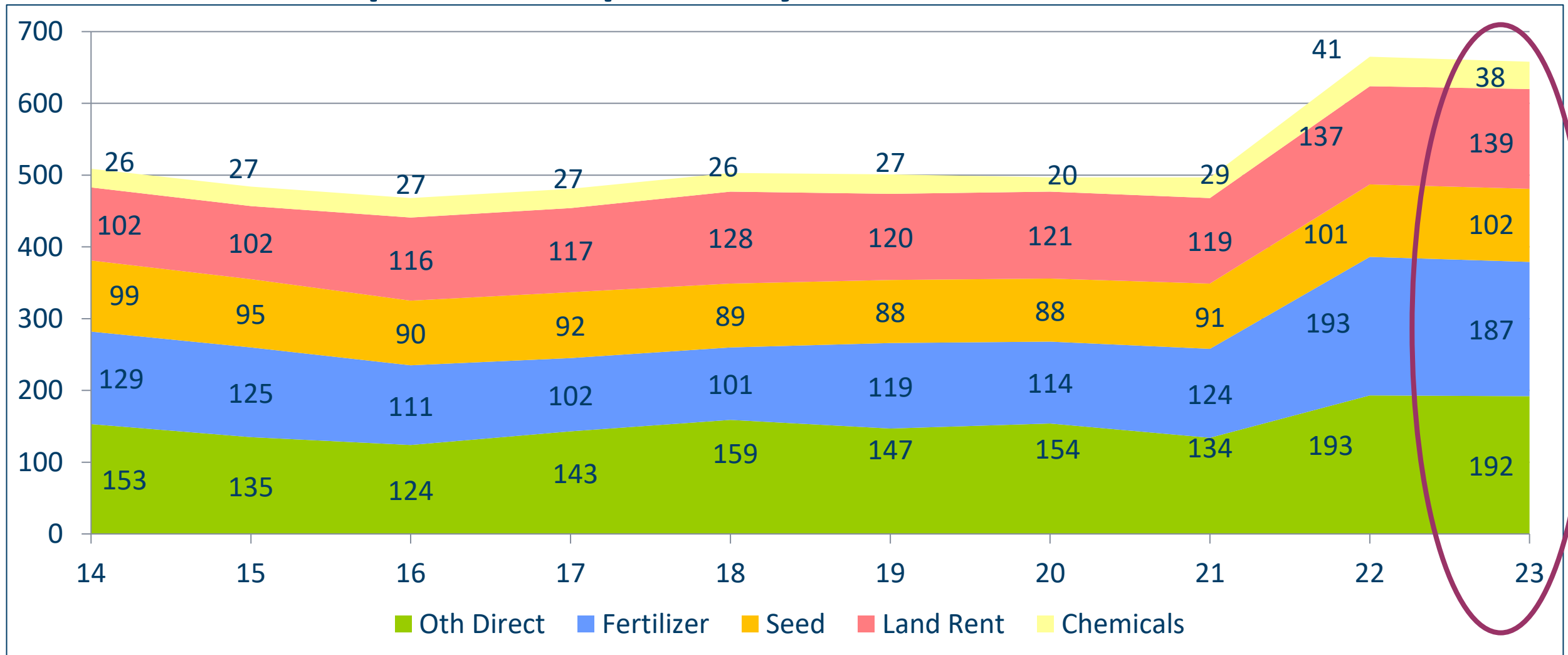


2-year Corn Data

	Rented		Owned	
	2022	2023	2022	2023
Yield per Acre	169.41	159.33	168.99	160.89
Value per Unit	\$6.06	\$4.69	\$6.09	\$4.67
Gross Revenue/Acre	1,039.01	827.02	1,044.68	830.18
Dir & Ovhd Expense/Acre	779.41	774.29	725.05	721.22
Net Return/Acre	259.60	52.74	319.63	108.96
Dir & Ovhd Expense/Unit	\$4.60	\$4.86	\$4.29	\$4.48

Corn Inputs – the past 10 years

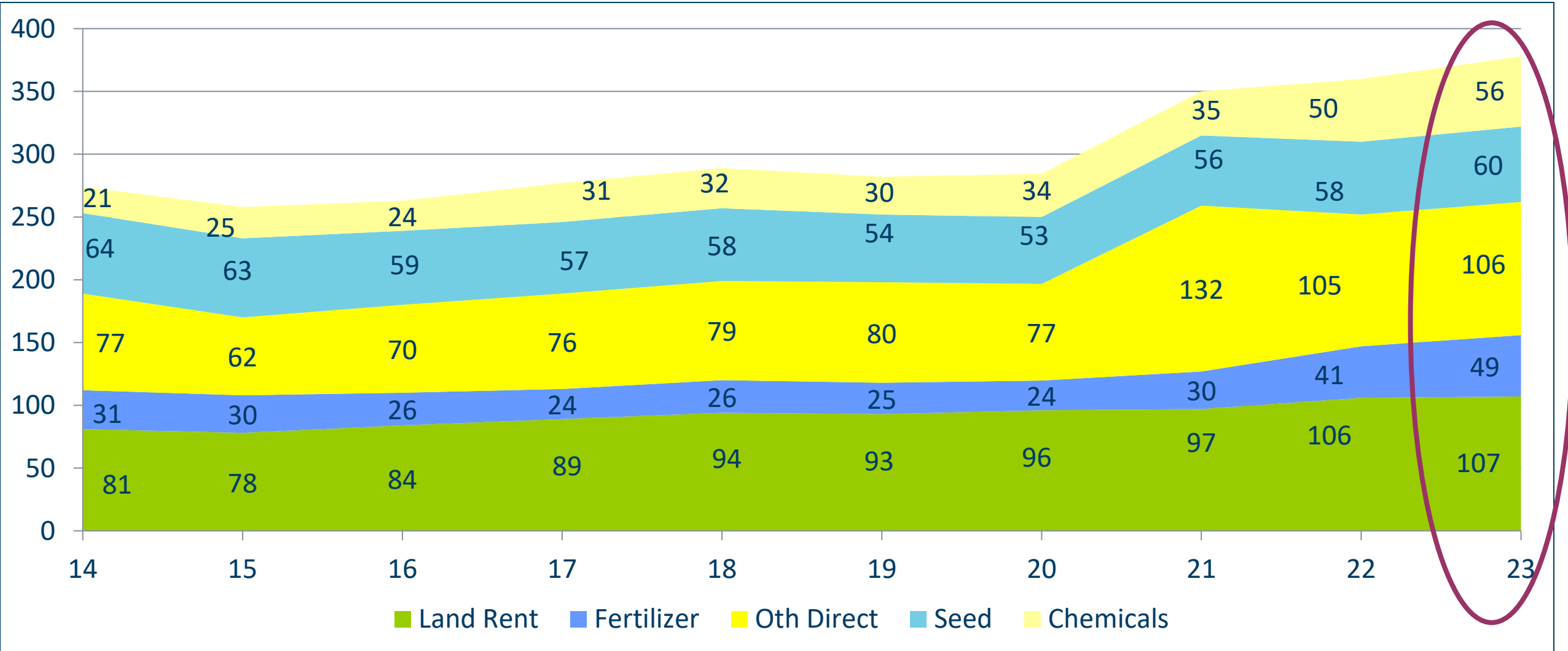
Pg 31



2-year Soybean Data

	Rented		Owned	
	2022	2023	2022	2023
Yield per Acre	39.9	39.4	39.7	39.7
Value per Unit	\$13.89	\$12.44	\$13.93	\$12.33
Gross Revenue/Acre	571.32	515.79	569.46	506.33
Dir & Ovhd Expense/Acre	420.41	442.87	379.03	390.01
Net Return/Acre	150.91	72.92	190.43	116.32
Dir & Ovhd Expense/Unit	\$10.55	\$11.24	\$9.55	\$9.83

Soybean Inputs – the past 10 years



AVERAGE CORN BUSHELS TO COVER CROP INPUT COSTS (2014-2024)
 (Based on Farm Business Management data on cash rented corn farms in Southern Minnesota.)
 August, 2024

Input Costs	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024 (Est.)
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Fertilizer	\$167	\$147	\$133	\$116	\$115	\$128	\$126	\$142	\$226	\$246	\$200
Chemicals	\$35	\$37	\$38	\$38	\$36	\$37	\$37	\$42	\$55	\$59	\$65
Other Costs	\$167	\$138	\$130	\$152	\$151	\$159	\$147	\$166	\$210	\$205	\$225
Total Input Costs	\$497	\$445	\$424	\$424	\$415	\$435	\$418	\$460	\$605	\$631	\$625
Ave. Price Per Bu.	\$3.97	\$3.52	\$3.35	\$3.23	\$3.48	\$3.76	\$4.09	\$5.40	\$6.31	\$4.86	\$4.20 (\$3.80)
Corn Bu. to cover Input Costs	125	126	127	131	119	116	102	86	96	130	149 (164)
Cash Rent (Ave./Acre)	\$251	\$235	\$230	\$219	\$217	\$214	\$214	\$227	\$249	\$262	\$275 (est.)
Corn Bu. to cover Cash Rent	63	67	69	68	62	57	52	43	40	54	65 (72)
Overhead Expense	\$111	\$110	\$101	\$99	\$94	\$95	\$99	\$107	\$114	\$120	\$125
Corn Bu. to cover Ovhd. Exp.	28	31	30	31	27	25	24	20	18	25	30 (33)
Total Costs Per Acre	\$859	\$790	\$755	\$742	\$726	\$744	\$731	\$794	\$968	\$1,013	\$1,025
Total Bu. to cover All Costs	216	224	226	230	208	198	178	149	154	208	244 (269)
Actual Corn Yield	167	206	205	215	178	180	207	206	213	203	????
Net Return over All Costs	(\$44)	(\$56)	(\$54)	(\$34)	(\$56)	+\$42	+\$169	+\$333	+\$379	+\$39	????

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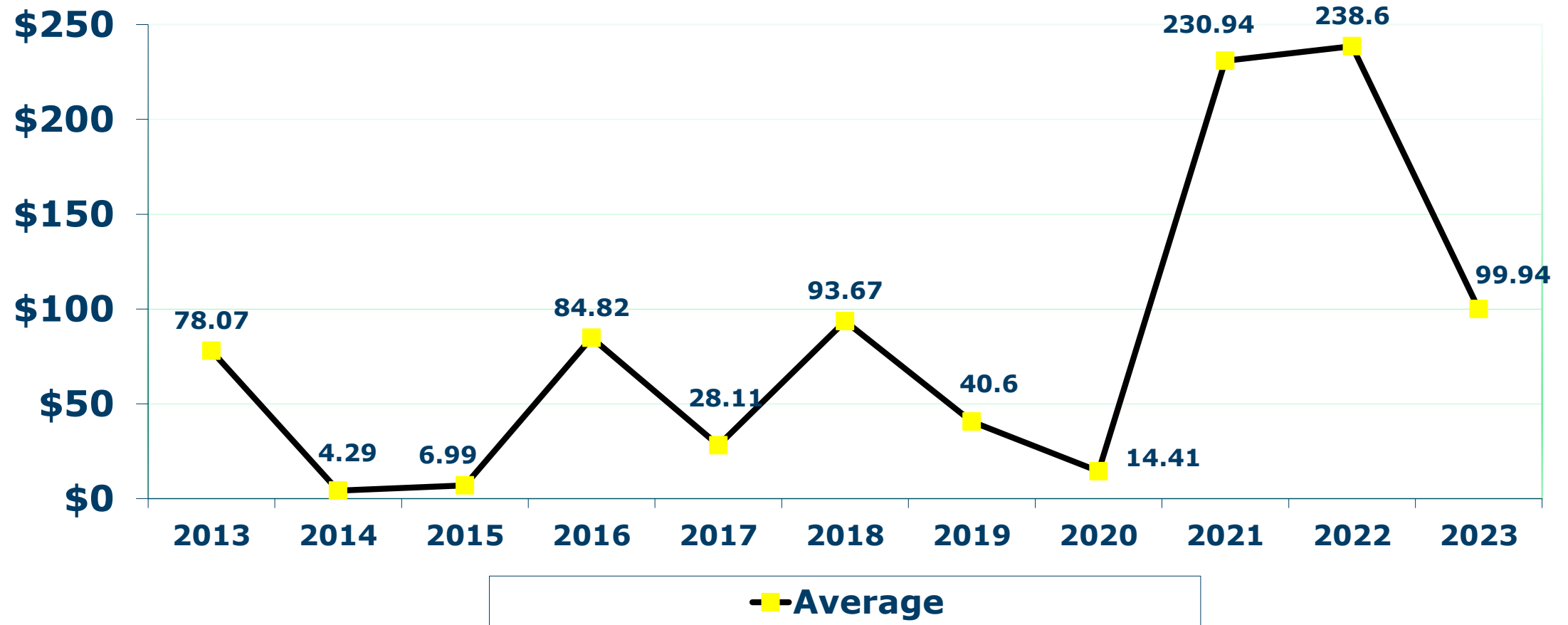
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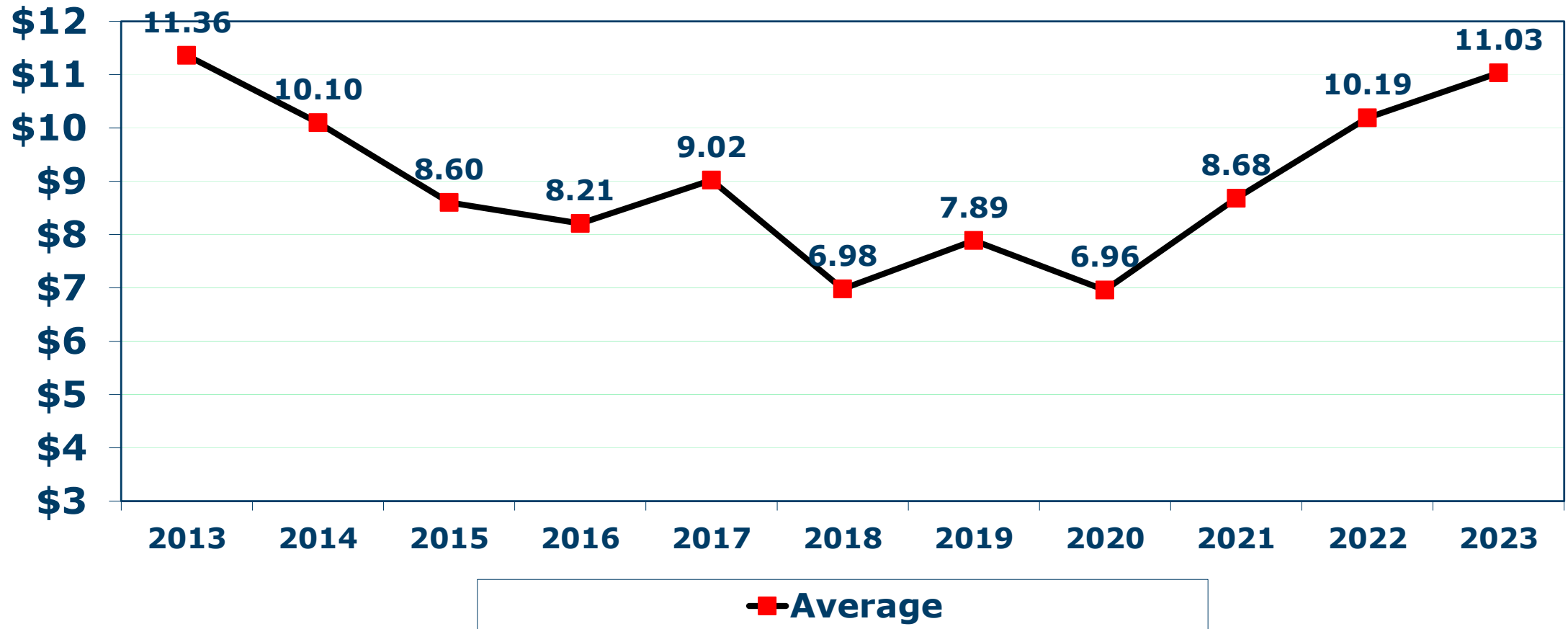
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NOTES:

Soybean Returns per Acre (before labor & mgmt.)



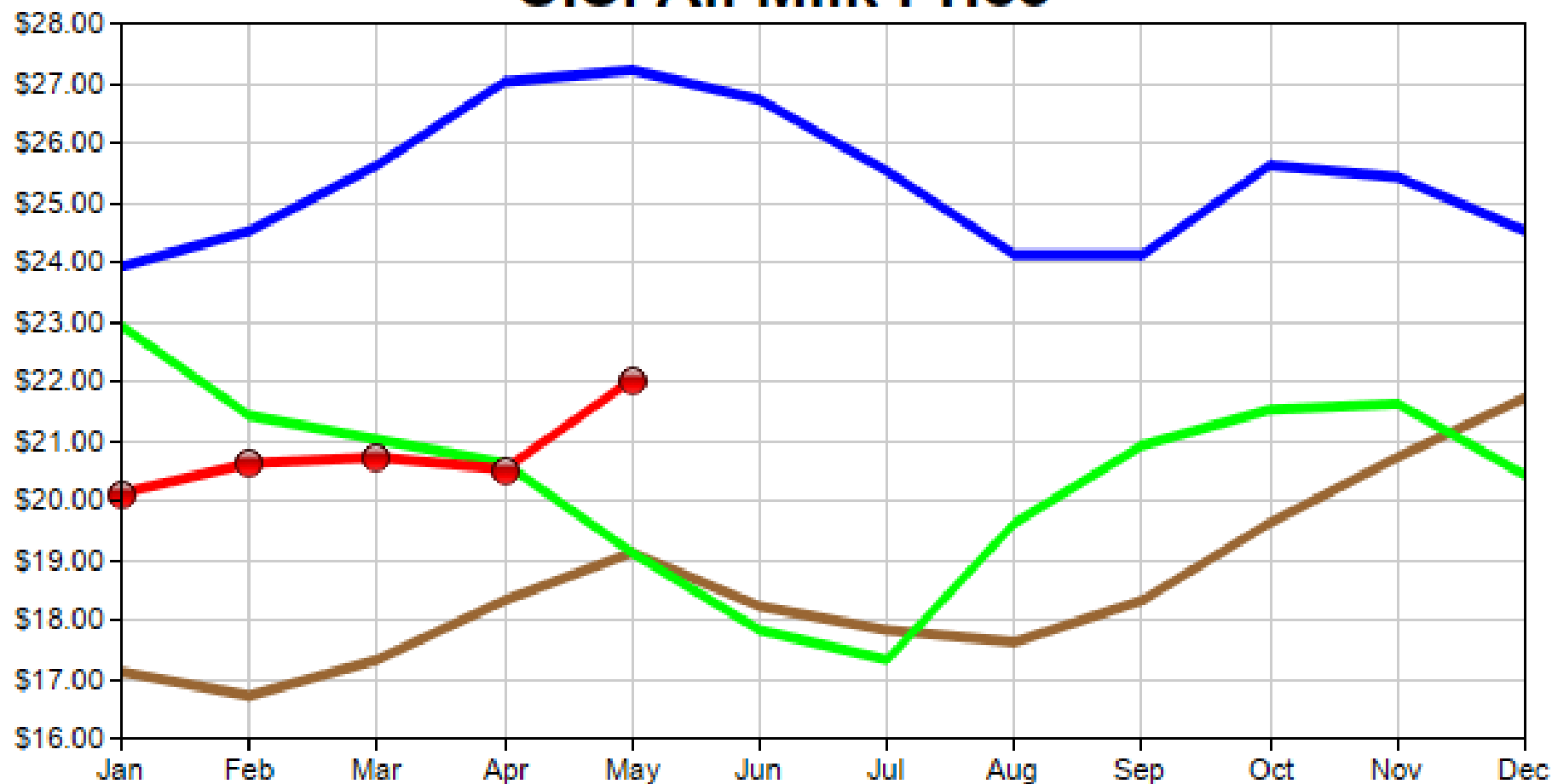
Total Listed Costs per bu. Soybeans (before labor & mgmt.)



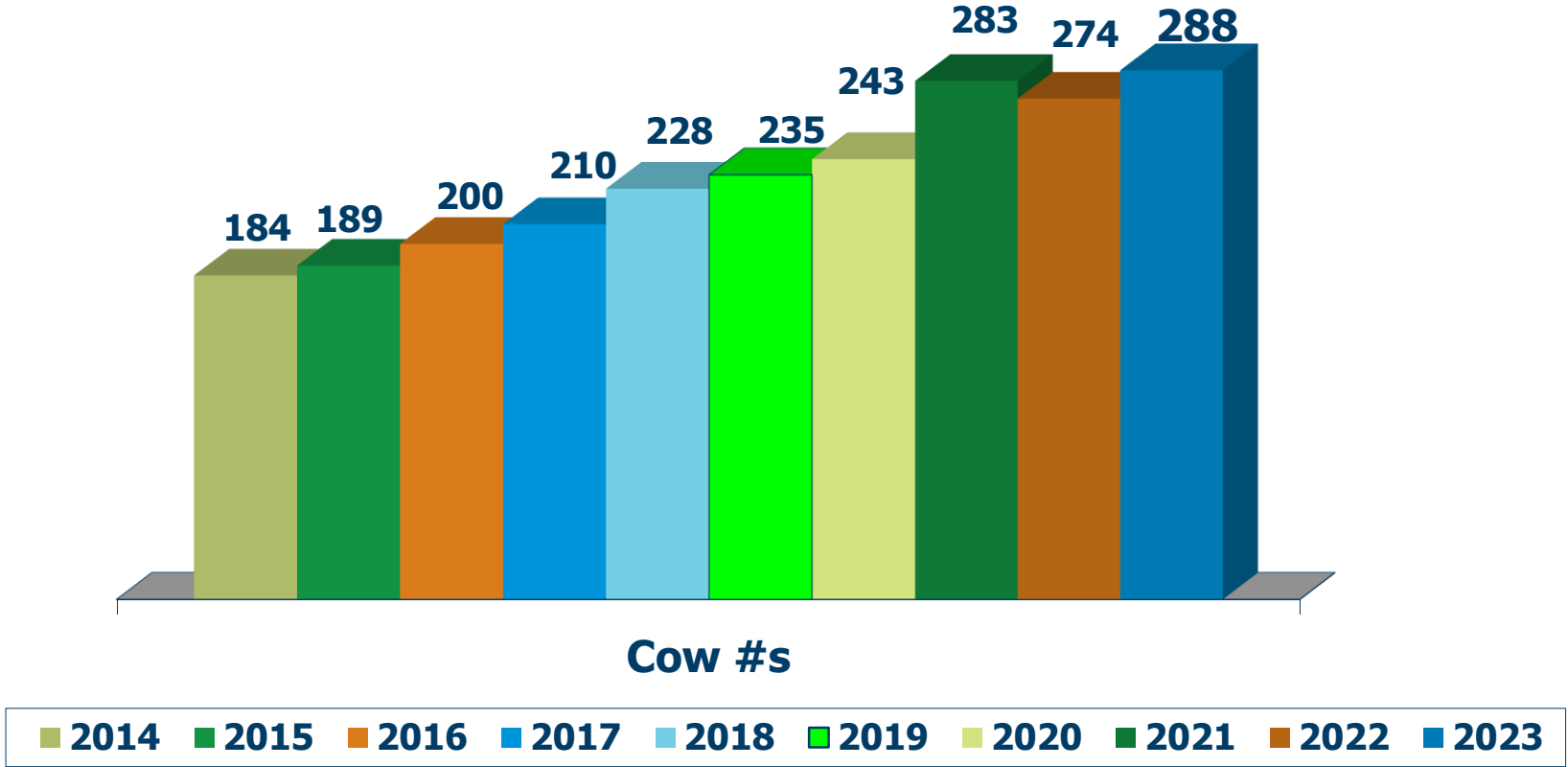
Dairy & Beef.....



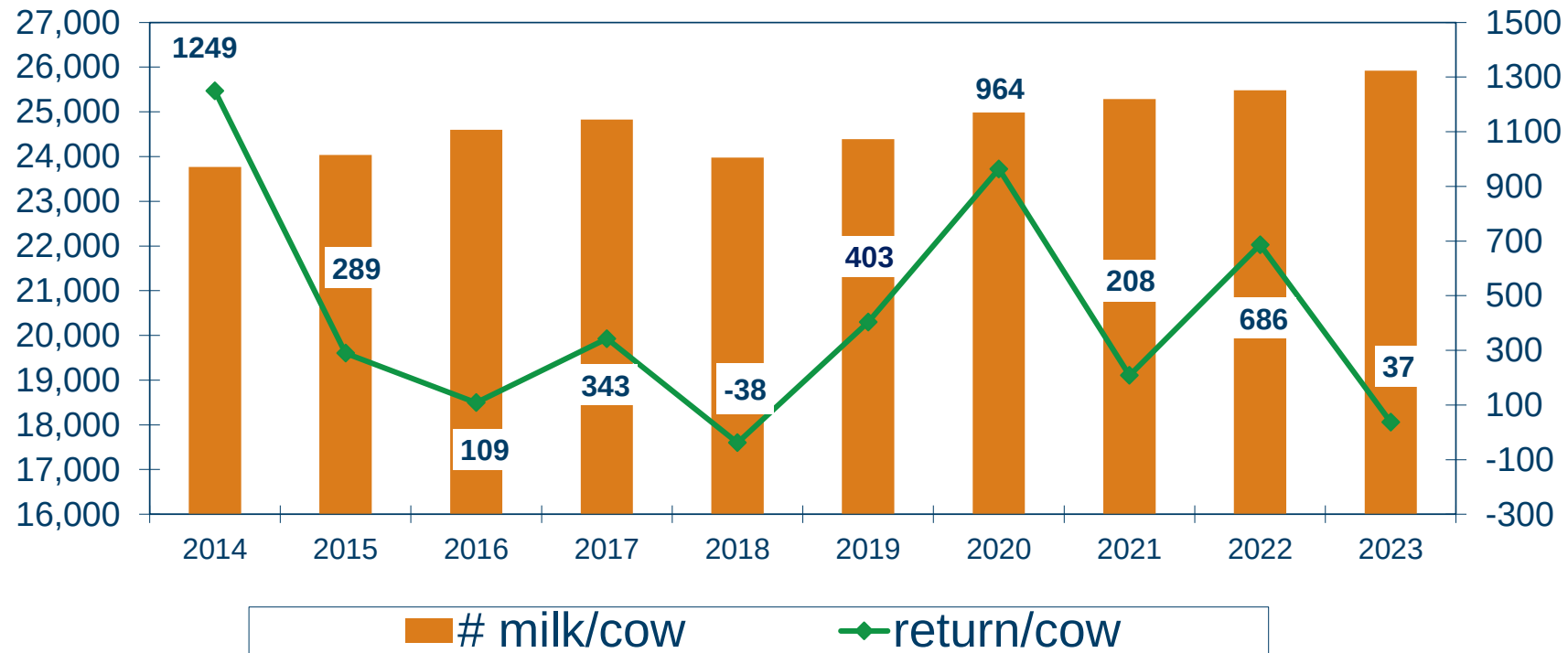
U.S. All Milk Price



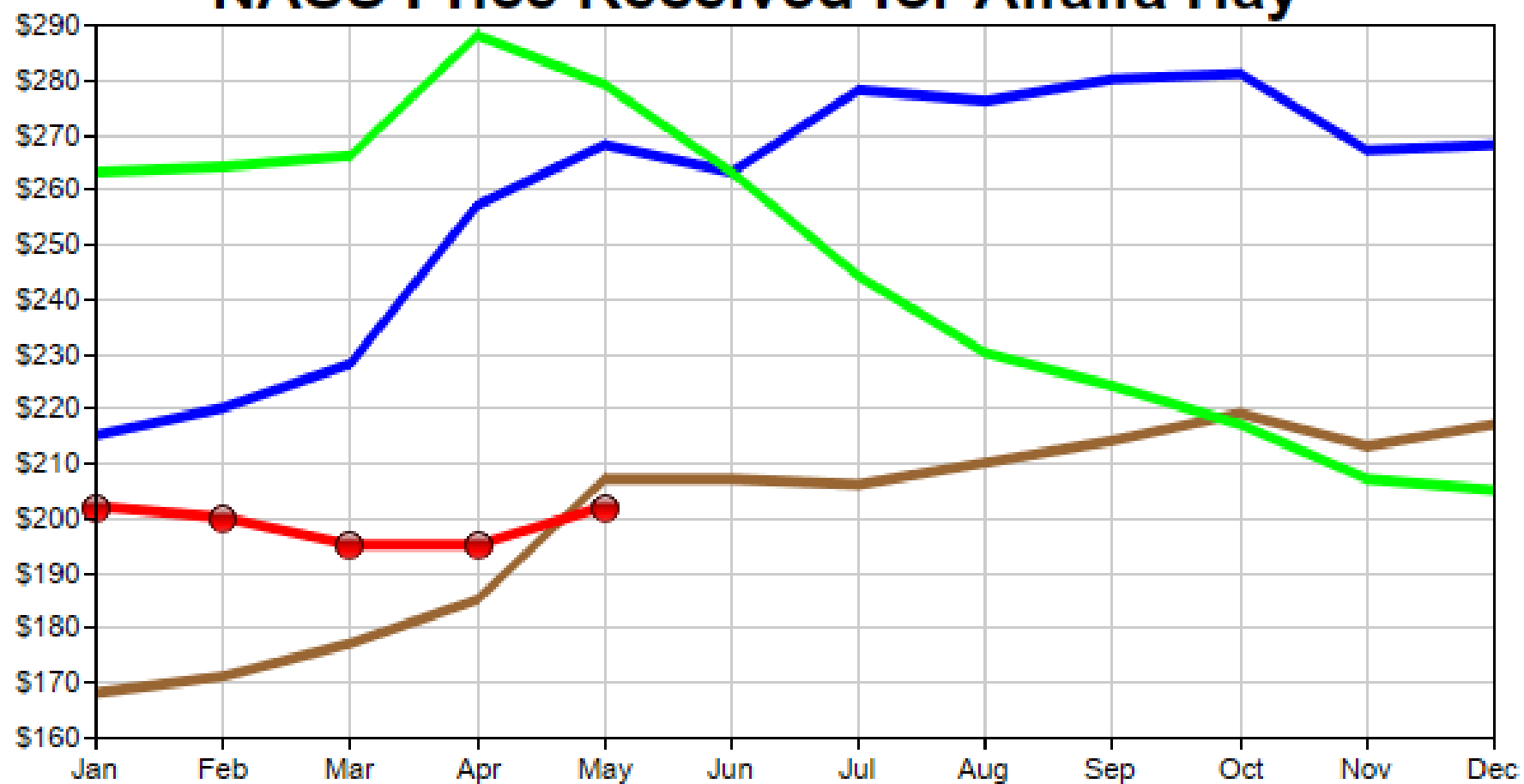
Number of Dairy Cows Average Farm



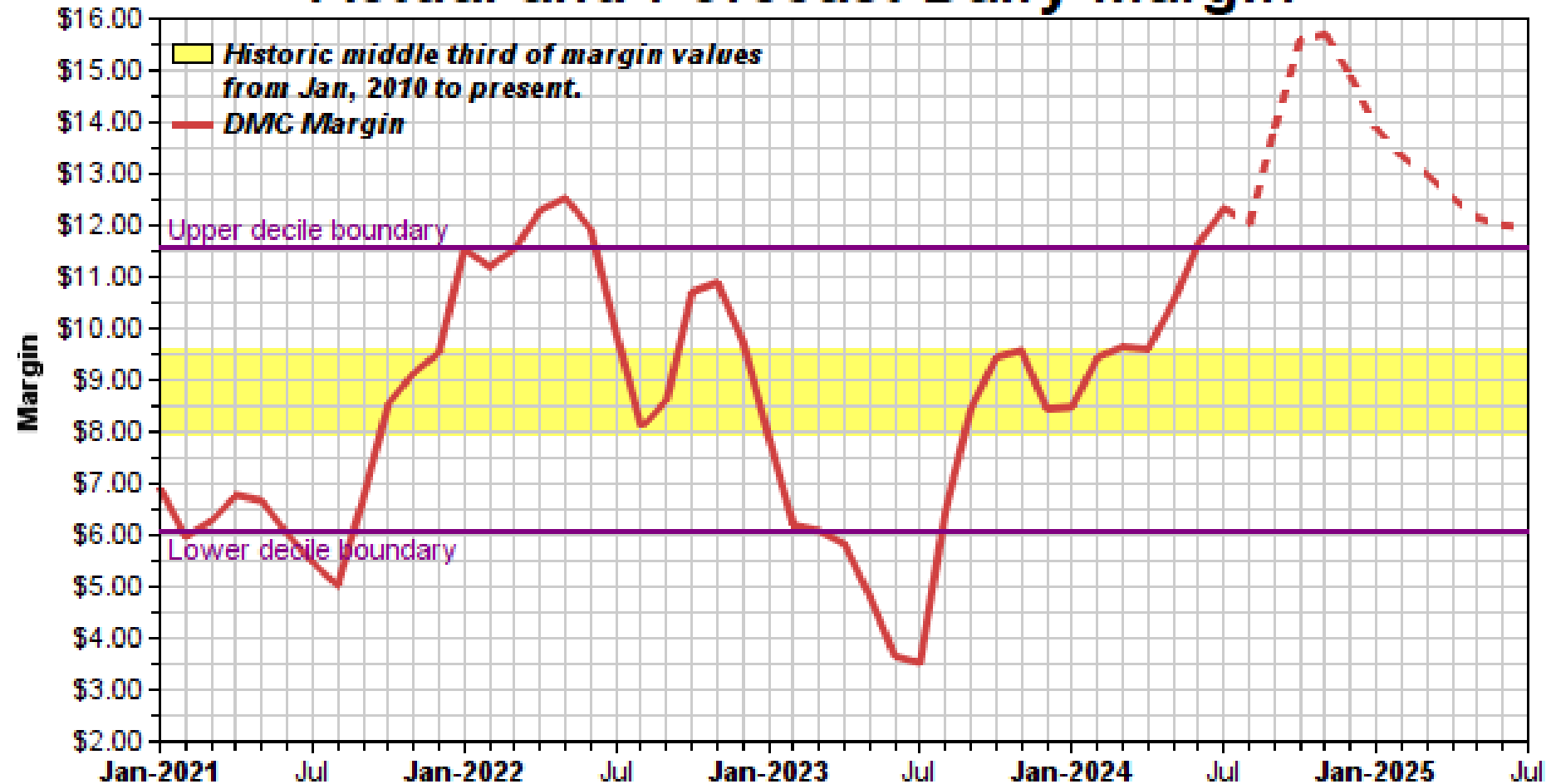
10 Year Production & Net Return Trends per Cow (before labor & mgt)



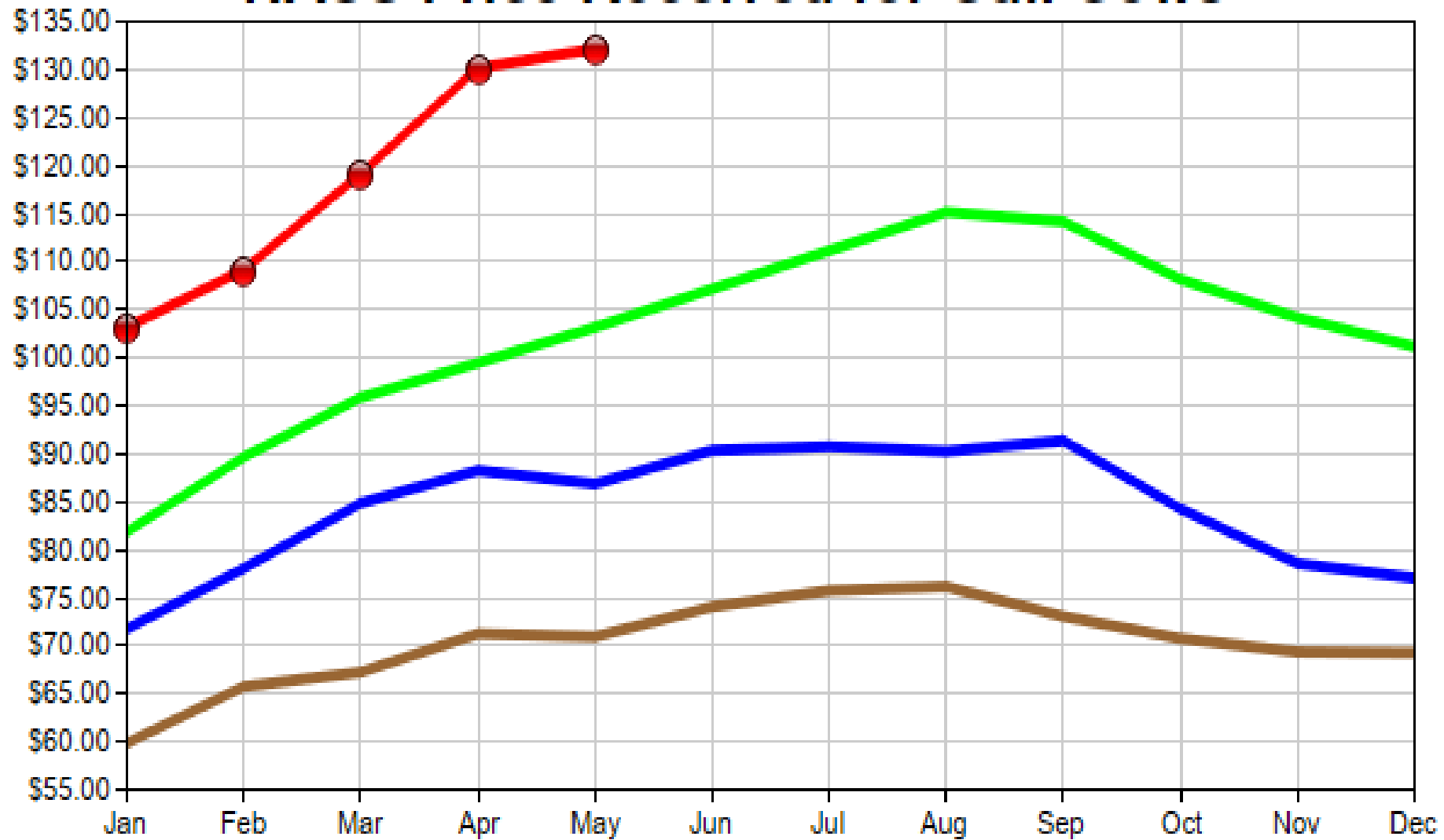
NASS Price Received for Alfalfa Hay



Actual and Forecast Dairy Margin

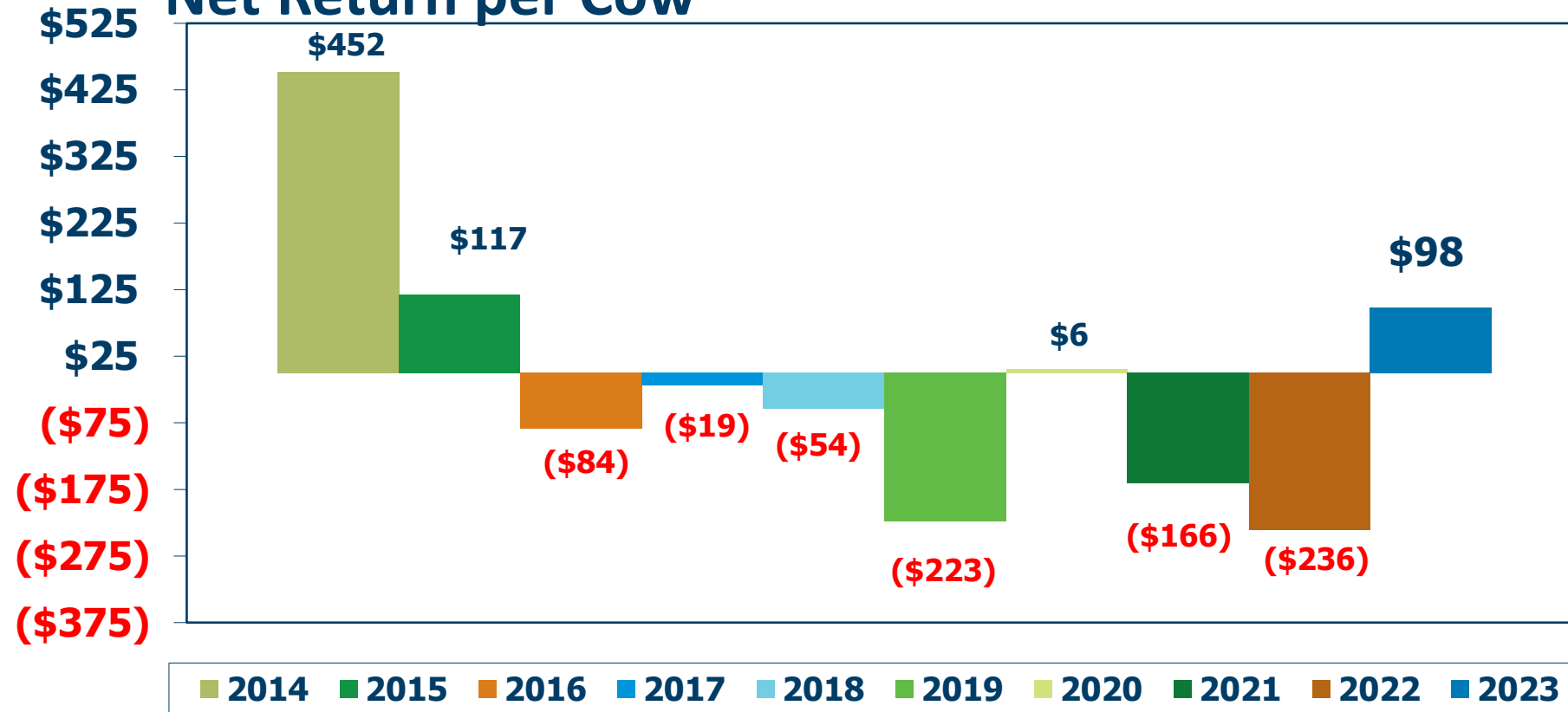


NASS Price Received for Cull Cows



Beef Cow-Calf Returns – No Backgrounding

Net Return per Cow



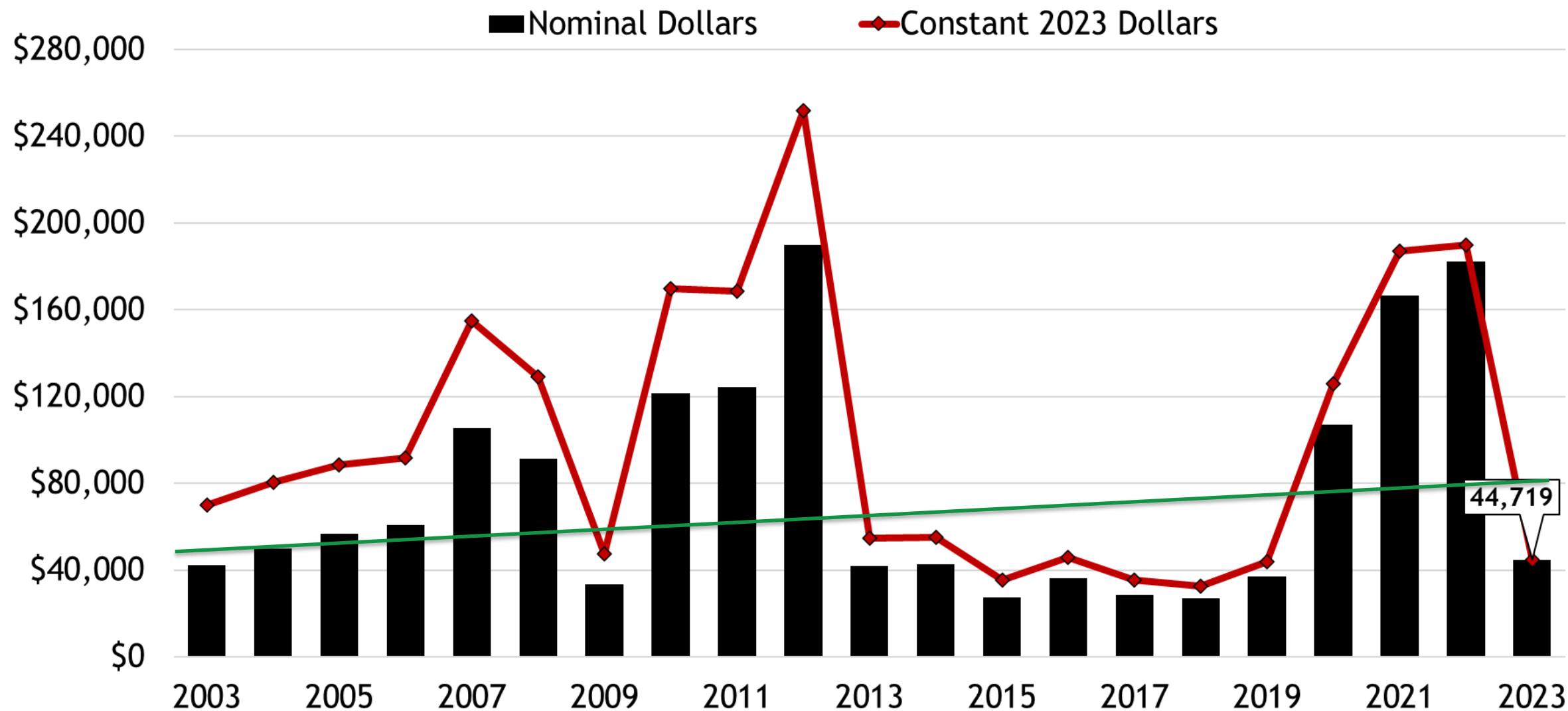
Beef Cow-Calf – With Backgrounding Only

Select Factors

Factor	2021		2022		2023	
	Avg	High 20%	Avg	High 20%	Avg	High 20%
Net Return	(\$165.68)	\$299.29	(\$235.79)	\$182.65	\$283.12	\$820.81
Number of Cows	61.2	60.3	67.2	59.4	81.9	125.7
Calving Percentage	92.0%	95.0%	90.9%	97.6%	90.1%	92.1%
Weaning Percentage	86.9%	92.4%	83.4%	95.5%	82.5%	83.8%
Cows Per FTE	268.9	212.8	262.7	278.0	297.3	355.2
Average Weaning Weight	527	544	536	554	514	506
Lb. Weaned/Exposed Cow	458	503	447	529	424	423
Feed Cost per Cow	\$549.62	\$486.66	\$640.45	\$476.05	\$620.34	\$449.29
Avg wgt/Beef Calves Sold	572	622	545	611	635	592
Avg Price/CWT	\$153.79	\$151.03	\$180.23	\$176.29	\$218.16	\$230.38

Median Net Farm Income

Data: Minnesota, All Farms





MINNESOTA STATE

Agricultural Centers of Excellence



MINNESOTA STATE
Northern Agricultural Center of Excellence

Keith Olander

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MINNESOTA STATE
Southern Agricultural Center of Excellence

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