

Crop Enterprise Analysis
2019 Moorhead Farm Business Management Annual Report
(Farms Sorted By Return to Overhead)

Corn on Owned Land

	<u>Avg. Of</u> <u>All Farms</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	24	5	5
Acres	242.27	333.20	174.20
Yield per acre (bu.)	160.09	155.61	194.42
Operators share of yield %	100.00	100.00	100.00
Value per bu.	3.43	3.46	3.47
Total product return per acre	549.46	538.55	674.39
Hedging gains/losses per acre	2.65	-	-
Crop insurance per acre	7.98	8.31	5.99
Other crop income per acre	56.70	55.12	57.98
Gross return per acre	616.78	601.98	738.36
Direct Expenses			
Seed and plants	90.44	99.66	84.73
Fertilizer	105.02	116.74	107.95
Crop chemicals	28.65	28.74	25.58
Crop insurance	19.07	17.12	21.26
Drying expense	11.59	8.79	7.14
Fuel & oil	22.90	18.78	24.79
Repairs	42.78	36.21	47.77
Custom hire	5.21	5.01	1.43
Hired labor	0.76	-	-
Machinery leases	3.50	2.37	12.13
Hauling and trucking	0.20	-	1.36
Marketing	0.31	-	0.63
Operating interest	15.34	18.96	13.09
Miscellaneous	11.97	2.47	1.10
Total direct expenses per acre	357.73	354.85	348.96
Return over direct exp per acre	259.05	247.13	389.40
Overhead Expenses			
Hired labor	32.93	19.17	26.19
Machinery leases	7.01	8.34	11.94
Building leases	1.07	1.17	3.03
RE & pers. property taxes	24.10	23.39	22.13
Farm insurance	8.85	7.39	13.07
Utilities	6.78	7.66	7.74
Dues & professional fees	4.39	3.54	7.16
Interest	62.53	81.61	60.55
Mach & bldg depreciation	41.91	44.24	36.16
Miscellaneous	7.38	4.05	10.36
Total overhead expenses per acre	196.94	200.56	198.35
Total dir & ovhd expenses per acre	554.67	555.41	547.30
Net return per acre	62.11	46.57	191.05
Government payments	1.53	0.30	1.07
Net return with govt pmts	63.64	46.87	192.12
Labor & management charge	48.23	37.39	46.99
Net return over lbr & mgt	15.41	9.48	145.13
Cost of Production			
Total direct expense per bu.	2.23	2.28	1.79
Total dir & ovhd exp per bu.	3.46	3.57	2.82
Less govt & other income	3.03	3.16	2.48
With labor & management	3.34	3.40	2.72
Net value per unit	3.45	3.46	3.47
Machinery cost per acre	120.05	113.72	133.06
Est. labor hours per acre	3.56	2.43	2.73

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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 farms	46	9	9	10
Acres	483.07	376.51	574.20	352.22
Yield per acre (bu.)	161.57	152.04	155.77	184.38
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	3.40	3.31	3.36	3.34
Total product return per acre	548.58	502.78	523.64	616.10
Hedging gains/losses per acre	6.28	-	15.51	16.84
Crop insurance per acre	9.65	-	7.29	-
Other crop income per acre	55.08	51.66	54.56	52.66
Gross return per acre	619.59	554.43	601.00	685.60
Direct Expenses				
Seed and plants	88.45	96.85	79.68	82.54
Fertilizer	105.36	116.57	99.86	103.88
Crop chemicals	28.08	37.77	21.58	26.21
Crop insurance	20.48	20.11	19.28	18.68
Drying expense	12.88	23.17	9.46	11.58
Storage	0.44	0.03	0.07	2.04
Fuel & oil	24.81	34.19	27.01	22.86
Repairs	44.52	48.65	49.61	49.19
Custom hire	5.05	10.03	3.51	2.52
Hired labor	1.64	4.05	3.29	-
Land rent	129.64	120.11	125.31	119.23
Machinery leases	3.23	1.28	10.38	0.56
Marketing	0.66	0.30	0.46	2.34
Operating interest	13.05	6.32	13.12	9.51
Miscellaneous	8.60	5.98	3.56	3.53
Total direct expenses per acre	486.88	525.43	466.18	454.67
Return over direct exp per acre	132.71	29.00	134.82	230.93
Overhead Expenses				
Hired labor	26.14	24.59	26.66	24.16
Machinery leases	4.91	0.40	4.18	3.85
Building leases	0.92	0.72	0.35	2.13
Farm insurance	7.59	11.85	5.97	7.89
Utilities	6.12	9.24	5.31	6.39
Dues & professional fees	3.71	5.68	2.81	4.46
Interest	4.55	5.98	3.09	2.75
Mach & bldg depreciation	43.94	59.59	44.74	36.11
Miscellaneous	8.90	6.60	11.99	8.21
Total overhead expenses per acre	106.79	124.66	105.10	95.95
Total dir & ovhd expenses per acre	593.68	650.09	571.28	550.62
Net return per acre	25.91	-95.66	29.72	134.98
Government payments	1.16	-	0.38	1.18
Net return with govt pmts	27.07	-95.66	30.09	136.16
Labor & management charge	51.20	59.84	59.48	39.88
Net return over lbr & mgt	-24.12	-155.50	-29.38	96.28
Cost of Production				
Total direct expense per bu.	3.01	3.46	2.99	2.47
Total dir & ovhd exp per bu.	3.67	4.28	3.67	2.99
Less govt & other income	3.23	3.94	3.17	2.60
With labor & management	3.54	4.33	3.55	2.82
Net value per unit	3.43	3.31	3.46	3.43
Machinery cost per acre	123.89	153.69	134.36	111.80
Est. labor hours per acre	3.08	3.29	2.58	2.57

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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 farms	33	6	6	7
Acres	286.48	318.87	263.42	218.74
Yield per acre (bu.)	38.50	34.68	37.86	45.39
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	8.17	7.81	8.11	8.15
Total product return per acre	314.68	271.01	306.88	369.82
Hedging gains/losses per acre	0.61	-	-	-
Crop insurance per acre	4.18	5.03	-	5.67
Other crop income per acre	52.03	49.95	54.94	43.02
Gross return per acre	371.50	325.98	361.82	418.51
Direct Expenses				
Seed and plants	65.05	73.10	65.95	57.83
Fertilizer	10.53	18.69	12.32	4.40
Crop chemicals	33.06	30.70	35.82	30.95
Crop insurance	19.21	18.79	17.67	19.21
Fuel & oil	13.66	13.96	13.45	14.80
Repairs	26.97	30.47	18.96	23.81
Custom hire	4.55	10.57	2.70	4.74
Hired labor	1.22	-	-	-
Operating interest	6.06	5.25	8.59	3.36
Miscellaneous	2.65	0.77	3.63	0.93
Total direct expenses per acre	182.97	202.30	179.09	160.04
Return over direct exp per acre	188.53	123.69	182.73	258.47
Overhead Expenses				
Hired labor	14.11	13.28	16.55	21.26
Machinery leases	2.82	0.23	0.26	8.13
Building leases	0.76	-	1.14	1.79
RE & pers. property taxes	25.56	18.33	22.15	31.36
Farm insurance	7.92	7.35	10.26	6.34
Utilities	5.37	8.32	6.10	4.27
Dues & professional fees	3.42	2.80	3.86	3.03
Interest	46.30	29.16	39.60	35.24
Mach & bldg depreciation	31.87	29.38	33.18	28.66
Miscellaneous	2.67	2.40	1.73	2.64
Total overhead expenses per acre	140.79	111.26	134.83	142.72
Total dir & ovhd expenses per acre	323.76	313.56	313.91	302.76
Net return per acre	47.74	12.43	47.90	115.75
Government payments	0.60	0.10	1.54	0.48
Net return with govt pmnts	48.34	12.53	49.44	116.23
Labor & management charge	32.55	28.62	41.72	33.06
Net return over lbr & mgt	15.79	-16.09	7.72	83.17
Cost of Production				
Total direct expense per bu.	4.75	5.83	4.73	3.53
Total dir & ovhd exp per bu.	8.41	9.04	8.29	6.67
Less govt & other income	6.92	7.45	6.80	5.59
With labor & management	7.76	8.28	7.90	6.31
Net value per unit	8.19	7.81	8.11	8.15
Machinery cost per acre	77.25	81.83	64.47	79.81
Est. labor hours per acre	1.67	1.63	2.28	1.83

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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 farms	54	10	11	11
Acres	549.93	491.59	556.00	459.51
Yield per acre (bu.)	38.72	33.31	40.33	44.16
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	8.21	8.17	8.18	8.16
Total product return per acre	317.93	272.28	330.04	360.19
Hedging gains/losses per acre	0.10	-	-	0.56
Crop insurance per acre	11.11	3.06	12.50	21.31
Other crop income per acre	52.56	54.72	53.38	51.42
Gross return per acre	381.69	330.05	395.93	433.48
Direct Expenses				
Seed and plants	63.35	65.89	63.39	58.92
Fertilizer	12.47	25.27	10.34	6.27
Crop chemicals	32.42	32.14	29.78	27.98
Crop insurance	18.41	20.19	22.01	17.33
Drying expense	0.43	-	1.58	0.08
Storage	0.69	-	0.12	0.10
Fuel & oil	14.03	13.85	14.64	12.57
Repairs	25.58	31.48	26.34	24.00
Custom hire	4.90	6.36	4.73	0.61
Hired labor	0.81	-	-	0.30
Land rent	129.01	145.02	136.80	120.06
Machinery leases	1.26	1.49	-	0.61
Operating interest	6.05	3.91	6.86	4.15
Miscellaneous	2.55	1.77	3.66	2.94
Total direct expenses per acre	311.96	347.37	320.26	275.93
Return over direct exp per acre	69.73	-17.32	75.67	157.55
Overhead Expenses				
Hired labor	10.43	10.54	14.17	6.78
Machinery leases	2.63	2.03	5.33	4.79
Building leases	1.25	1.28	1.03	2.21
Farm insurance	6.72	7.25	5.92	5.15
Utilities	3.22	3.63	3.54	2.66
Dues & professional fees	3.13	4.36	3.46	2.71
Interest	3.18	2.30	2.18	3.01
Mach & bldg depreciation	24.55	23.70	19.63	26.54
Miscellaneous	4.28	6.67	2.17	2.80
Total overhead expenses per acre	59.39	61.75	57.42	56.63
Total dir & ovhd expenses per acre	371.35	409.12	377.68	332.56
Net return per acre	10.34	-79.07	18.25	100.92
Government payments	0.56	0.10	0.11	0.19
Net return with govt pmts	10.90	-78.97	18.36	101.11
Labor & management charge	28.93	24.89	30.21	32.52
Net return over lbr & mgt	-18.03	-103.86	-11.85	68.59
Cost of Production				
Total direct expense per bu.	8.06	10.43	7.94	6.25
Total dir & ovhd exp per bu.	9.59	12.28	9.37	7.53
Less govt & other income	7.93	10.54	7.73	5.87
With labor & management	8.68	11.29	8.48	6.60
Net value per unit	8.21	8.17	8.18	8.17
Machinery cost per acre	73.42	78.71	70.65	68.03
Est. labor hours per acre	1.39	1.26	1.45	1.29

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Soybeans Seed on Owned Land

	<u>Avg. Of All Farms</u>
Number of farms	8
Acres	330.08
Yield per acre (bu.)	40.34
Operators share of yield %	100.00
Value per bu.	9.52
Total product return per acre	383.92
Crop insurance per acre	11.75
Other crop income per acre	65.01
Gross return per acre	460.68
Direct Expenses	
Seed and plants	61.91
Fertilizer	3.20
Crop chemicals	35.71
Crop insurance	19.09
Storage	0.42
Fuel & oil	12.33
Repairs	24.07
Machinery leases	3.02
Marketing	0.50
Operating interest	10.83
Miscellaneous	3.99
Total direct expenses per acre	175.06
Return over direct exp per acre	285.61
Overhead Expenses	
Hired labor	34.12
Machinery leases	7.09
Building leases	1.01
RE & pers. property taxes	25.10
Farm insurance	2.38
Utilities	2.45
Dues & professional fees	1.77
Interest	74.18
Mach & bldg depreciation	17.27
Miscellaneous	4.17
Total overhead expenses per acre	169.54
Total dir & ovhd expenses per acre	344.60
Net return per acre	116.08
Government payments	4.65
Net return with govt pmts	120.73
Labor & management charge	27.87
Net return over lbr & mgt	92.86
Cost of Production	
Total direct expense per bu.	4.34
Total dir & ovhd exp per bu.	8.54
Less govt & other income	6.52
With labor & management	7.22
Net value per unit	9.52
Machinery cost per acre	61.33
Est. labor hours per acre	3.36

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Soybeans Seed on Cash Rent

	<u>Avg. Of All Farms</u>
Number of farms	20
Acres	674.91
Yield per acre (bu.)	40.09
Operators share of yield %	100.00
Value per bu.	9.45
Total product return per acre	378.73
Crop insurance per acre	12.54
Other crop income per acre	59.22
Gross return per acre	450.49
Direct Expenses	
Seed and plants	61.26
Fertilizer	8.73
Crop chemicals	37.24
Crop insurance	18.73
Storage	1.24
Fuel & oil	13.24
Repairs	26.77
Custom hire	1.60
Land rent	132.43
Machinery leases	2.95
Hauling and trucking	0.78
Marketing	0.55
Operating interest	8.60
Miscellaneous	4.10
Total direct expenses per acre	318.22
Return over direct exp per acre	132.27
Overhead Expenses	
Hired labor	22.11
Machinery leases	4.04
Building leases	0.62
Farm insurance	4.63
Utilities	3.05
Dues & professional fees	2.86
Interest	1.38
Mach & bldg depreciation	21.67
Miscellaneous	3.95
Total overhead expenses per acre	64.31
Total dir & ovhd expenses per acre	382.52
Net return per acre	67.96
Government payments	2.45
Net return with govt pmts	70.41
Labor & management charge	29.30
Net return over lbr & mgt	41.11
Cost of Production	
Total direct expense per bu.	7.94
Total dir & ovhd exp per bu.	9.54
Less govt & other income	7.69
With labor & management	8.42
Net value per unit	9.45
Machinery cost per acre	68.53
Est. labor hours per acre	2.30

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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 farms	37	7	8	8
Acres	234.80	159.58	272.56	261.41
Yield per acre (bu.)	61.52	55.31	64.86	62.34
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	4.79	4.61	4.66	5.14
Total product return per acre	294.78	254.91	302.42	320.24
Crop insurance per acre	47.43	11.77	48.29	82.78
Other crop income per acre	55.03	59.72	55.83	47.31
Gross return per acre	397.24	326.39	406.55	450.33
Direct Expenses				
Seed and plants	23.03	20.30	26.32	23.07
Fertilizer	86.73	89.57	90.39	81.14
Crop chemicals	32.24	39.50	30.08	31.67
Crop insurance	15.34	14.01	18.72	15.66
Drying expense	1.46	0.76	2.05	-
Storage	1.08	3.38	1.78	-
Fuel & oil	12.64	15.02	15.56	9.13
Repairs	24.52	30.75	30.95	15.73
Custom hire	6.35	7.84	6.83	4.45
Hired labor	1.64	-	0.13	6.67
Machinery leases	1.37	0.43	4.20	0.76
Hauling and trucking	0.14	-	0.58	-
Operating interest	7.38	11.27	6.31	5.47
Miscellaneous	3.25	3.77	2.07	3.36
Total direct expenses per acre	217.17	236.59	235.96	197.12
Return over direct exp per acre	180.08	89.80	170.58	253.21
Overhead Expenses				
Hired labor	13.88	16.13	21.32	4.88
Machinery leases	3.62	1.19	2.51	6.49
Building leases	1.02	-	1.06	2.56
RE & pers. property taxes	25.54	28.55	23.97	19.64
Farm insurance	8.02	7.25	10.50	6.84
Utilities	4.38	5.68	6.40	2.96
Dues & professional fees	3.80	2.86	4.64	2.80
Interest	51.44	80.37	37.40	35.63
Mach & bldg depreciation	26.66	24.07	29.18	27.55
Miscellaneous	3.73	2.71	3.84	5.84
Total overhead expenses per acre	142.10	168.81	140.81	115.20
Total dir & ovhd expenses per acre	359.26	405.40	376.77	312.32
Net return per acre	37.98	-79.01	29.77	138.01
Government payments	1.55	4.37	0.95	0.16
Net return with govt pmts	39.53	-74.64	30.73	138.17
Labor & management charge	27.88	27.27	30.03	27.83
Net return over lbr & mgt	11.65	-101.91	0.70	110.34
Cost of Production				
Total direct expense per bu.	3.53	4.28	3.64	3.16
Total dir & ovhd exp per bu.	5.84	7.33	5.81	5.01
Less govt & other income	4.15	5.96	4.19	2.92
With labor & management	4.60	6.45	4.65	3.37
Net value per unit	4.79	4.61	4.66	5.14
Machinery cost per acre	74.29	81.05	84.86	66.05
Est. labor hours per acre	1.77	1.78	1.88	1.22

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	<u>Avg. Of</u> <u>All Farms</u>	<u>Low 20%</u>	<u>40 - 60%</u>	<u>High 20%</u>
Number of farms	62	12	13	13
Acres	576.82	349.37	761.31	464.72
Yield per acre (bu.)	61.25	55.65	62.67	64.12
Operators share of yield %	100.00	100.00	100.00	100.00
Value per bu.	4.77	4.61	4.65	5.22
Total product return per acre	292.08	256.39	291.69	334.48
Hedging gains/losses per acre	0.44	2.61	-	0.77
Crop insurance per acre	61.56	35.27	55.60	72.36
Other crop income per acre	53.20	56.30	54.90	51.65
Gross return per acre	407.28	350.57	402.19	459.26
Direct Expenses				
Seed and plants	22.33	26.30	20.64	21.57
Fertilizer	89.66	99.44	91.69	77.18
Crop chemicals	32.82	33.12	33.78	28.83
Crop insurance	14.81	15.01	13.09	16.09
Drying expense	1.08	2.44	2.11	0.01
Storage	1.21	2.46	1.50	-
Fuel & oil	13.83	13.57	14.34	12.85
Repairs	26.69	26.48	27.10	19.96
Custom hire	5.79	9.51	5.07	2.32
Hired labor	0.94	-	-	0.09
Land rent	133.26	152.69	135.61	117.15
Machinery leases	1.42	7.94	0.08	2.29
Operating interest	6.49	9.28	7.65	5.85
Miscellaneous	4.62	11.48	3.64	5.90
Total direct expenses per acre	354.95	409.72	356.31	310.07
Return over direct exp per acre	52.33	-59.14	45.88	149.18
Overhead Expenses				
Hired labor	12.55	12.78	12.77	9.83
Machinery leases	3.42	1.41	2.30	6.59
Building leases	1.56	0.02	1.30	3.02
Farm insurance	6.73	5.94	7.50	6.56
Utilities	3.15	2.98	2.42	2.41
Dues & professional fees	3.57	5.65	3.11	4.28
Interest	2.81	2.19	4.35	3.59
Mach & bldg depreciation	24.40	22.00	26.03	20.39
Miscellaneous	4.29	3.17	2.79	2.30
Total overhead expenses per acre	62.47	56.14	62.57	58.96
Total dir & ovhd expenses per acre	417.42	465.86	418.88	369.03
Net return per acre	-10.14	-115.28	-16.69	90.23
Government payments	0.79	0.47	0.83	0.87
Net return with govt pmts	-9.35	-114.81	-15.86	91.10
Labor & management charge	28.16	30.60	27.51	30.54
Net return over lbr & mgt	-37.51	-145.41	-43.37	60.56
Cost of Production				
Total direct expense per bu.	5.80	7.36	5.68	4.84
Total dir & ovhd exp per bu.	6.82	8.37	6.68	5.76
Less govt & other income	4.92	6.67	4.91	3.80
With labor & management	5.38	7.22	5.35	4.27
Net value per unit	4.78	4.65	4.65	5.23
Machinery cost per acre	75.72	80.60	76.58	65.79
Est. labor hours per acre	1.48	1.56	1.67	1.29