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Cost of Production Summary for
Major Manitoba Field Crops 1994.

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Cost of Production Summary for
Major Manitoba Field Crops 1994.

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Cost of Production Summary for Major Manitoba Field Crops

The objective of the 1994 Agriculture Canada Grain Cost of Production Study was to obtain cost information for grains and oilseed production in the province of Manitoba. The information was needed by Agriculture Canada to improve the accuracy of their regional cost of production modeling efforts. This report summarizes the costs of production of various grain and oilseed crops produced in Manitoba.

The survey sample consisted of 46 grain farms in the province of Manitoba. It is important to note that this is not a random sample. While the sample is not a random sample, it can be considered a representative sample. The farms represent 8 of the 12 Agricultural Census Regions within the province. The farms ranged in size from 154 to 3800 acres with the average farm size being 1067 acres.

There were 23 different crops produced on the survey farms. For the sake of confidentiality, crops produced on fewer than 3 farms are not included in this summary. Table 1 summarizes the crops and the number of farms producing each crop.

Fertilizer use by crop was obtained in the survey. The actual pounds of each nutrient, N, P, K and S applied by crop is summarized in Table 2. The minimum and maximum amount of N applied is also included. Crops produced on fewer than 3 farms are not reported here.

Crop budgets are given in Tables 3-14. These budgets are completed on a per acre basis. Depreciation cost is calculated at 10% of market value for machinery and 5% of market value for buildings. The investment cost is calculated at a 5% opportunity cost on the market value of capital assets.

Using the expected market price a break-even yield analysis was done for each reported crop. The break-even yield is the yield required, given the expected market price, so that revenue generated exactly covers costs. The break-even yields can be compared to the actual yield and the yield under normal weather conditions.

Table 1. Number of survey farms by crop

Crop	Number of Farms
Alfalfa Seed	1
Malting Barley	7
Feed Barley	15
Buckwheat	1
Canary Seed	2
Canola	40
Clover Hay	1
Corn	2
Faba Beans	2
Flax	23
Green Feed	1
Lentils	5
Linola	1
Navy Beans	2
Oats	17
Peas	7
Rye	1
Sugar Beets	1
Sunflowers	9
Tame Hay	9
Hard Red Spring Wheat	38
Feed Wheat	10
Durum Wheat	5

Table 2: Average pounds of actual nutrients applied per acre by crop

Crop	N	Minimum N	Maximum N	P	K	S
Malting Barley	61.00	50.00	72.00	28.00	1.43	0.00
Feed Barley	84.08	50.00	117.00	28.23	6.53	2.47
Canola	89.69	40.00	135.00	27.01	1.65	8.53
Flax	73.12	28.00	114.00	16.85	1.50	2.77
Lentils	33.20	0.00	85.00	27.00	0.00	4.00
Oats	65.28	0.00	121.00	26.08	6.79	1.96
Peas	8.64	0.00	20.00	27.29	1.43	6.00
Sunflowers	81.89	50.00	100.00	21.67	8.89	5.17
Tame Hay	5.56	0.00	50.00	3.89	0.00	0.00
Hard Red Spring Wheat	75.11	0.00	124.00	27.06	3.47	1.19
Feed Wheat	71.20	50.00	105.00	27.60	2.60	1.80
Durum Wheat	49.30	35.00	60.00	28.00	2.00	1.00

Table 3: Per Acre Budget for Malting Barley

	Average	Standard Deviation	Min	Max
Number of acres	231.43	157.53	80.00	500.00
RETURNS				
Yield Obtained	63.00	9.45	47.00	75.00
Expected Market Price	3.00	0.24	2.75	3.50
GRIP, Crop and Hail Receipts	0.00	0.00	0.00	0.00
GROSS RETURNS	188.61	27.59	141.00	225.00
VARIABLE OPERATING COSTS				
Fertilizers	20.01	4.92	13.56	26.78
Herbicides	8.75	5.61	4.65	17.50
Pesticides	0.00	0.00	0.00	0.00
Seed-purchased	8.05	2.85	3.77	11.25
Seed-home grown	0.00	0.00	0.00	0.00
Fuel	6.47	1.25	5.00	8.00
Repairs-Machinery	5.87	3.98	1.36	13.14
Repairs-Buildings	1.83	1.65	0.35	5.00
Custom Work	0.97	2.56	0.00	6.78
Hired Labour	0.60	1.60	0.00	4.23
Hail/Crop Ins.	3.97	3.51	0.00	8.50
Grip Premiums	3.59	2.48	0.00	5.62
Other Operating	0.14	0.38	0.00	1.00
Int. on Operating	2.26	0.49	1.59	2.92
TOTAL VARIABLE OPERATING COSTS	62.51	13.48	44.10	80.70
FIXED COSTS				
Land Taxes	3.86	1.72	1.92	7.25
Land Rental	9.96	8.69	0.00	25.00
Depreciation				
-machinery	19.77	9.38	7.22	32.14
-buildings	3.27	1.83	0.93	6.25
Other fixed costs (hydro, phone, admin, etc)	3.56	1.25	2.12	5.25
TOTAL FIXED COSTS	40.42	4.57	33.83	46.90
TOTAL COSTS	102.93	12.79	84.52	123.18
NET INCOME	85.68	21.90	50.82	112.68
LESS INVESTMENT COST :				
-Machinery	11.79	5.57	4.34	19.29
-Buildings	3.92	2.19	1.11	7.50
-Land	18.74	7.12	6.42	29.45
TOTAL INVESTMENT COSTS	34.45	10.25	17.68	49.81
RETURN TO LABOUR & MANAGEMENT	51.23	19.38	17.96	74.19
Break-even Yield Analysis				
Operating Costs	20.82			
Operating + Fixed Costs	34.28			
Expected yield under normal weather conditions	69.29	6.73	60.00	75.00

Table 4: Per Acre Budget for Feed Barley

	Average	Standard Deviation	Min	Max
Number of acres	120.20	82.00	20.00	365.00
RETURNS				
Yield Obtained	61.56	15.60	33.00	82.00
Expected Market Price	2.20	0.43	1.79	3.00
GRIP, Crop and Hail Receipts	10.83	22.80	0.00	73.57
GROSS RETURNS	145.21	29.05	100.00	219.00
VARIABLE OPERATING COSTS				
Fertilizers	26.14	6.96	13.56	37.80
Herbicides	12.80	6.19	3.30	20.46
Pesticides	0.88	3.11	0.00	12.08
Seed-purchased	6.10	4.41	0.00	13.00
Seed-home grown	1.31	2.41	0.00	7.50
Fuel	8.61	2.39	5.57	14.71
Repairs-Machinery	7.46	3.73	1.50	14.91
Repairs-Buildings	0.93	0.91	0.00	2.78
Custom Work	1.06	1.90	0.00	5.35
Hired Labour	0.76	2.02	0.00	7.50
Hail/Crop Ins.	3.19	2.25	0.00	6.00
Grip Premiums	6.41	3.96	0.00	12.56
Other Operating	0.75	0.99	0.00	3.20
Int. on Operating	2.87	0.49	1.70	3.71
TOTAL VARIABLE OPERATING COSTS	79.28	13.62	47.07	102.67
FIXED COSTS				
Land Taxes	4.23	2.00	1.63	7.70
Land Rental	10.31	10.23	0.00	29.55
Depreciation				
-machinery	16.22	5.11	5.45	24.54
-buildings	2.82	1.60	0.65	5.71
Other fixed costs (hydro, phone, admin, etc)	3.30	2.07	0.00	7.24
TOTAL FIXED COSTS	36.87	9.42	24.99	60.64
TOTAL COSTS	116.15	17.07	84.50	153.98
NET INCOME	29.07	27.18	-9.92	98.06
LESS INVESTMENT COST :				
-Machinery	9.64	3.17	2.48	14.73
-Buildings	3.39	1.92	0.78	6.86
-Land	24.27	13.74	0.93	50.14
TOTAL INVESTMENT COSTS	37.30	16.15	4.19	63.60
RETURN TO LABOUR & MANAGEMENT	-8.24	29.79	-38.89	74.87
Break-even Yield Analysis				
Operating Costs	36.09	9.06	15.69	50.31
Operating + Fixed Costs	52.87	11.34	30.06	72.29
Expected yield under normal weather conditions	79.73	9.35	60.00	100.00

Table 5: Per Acre Budget for Canola

	Average	Standard Deviation	Min	Max
Number of acres	312.93	217.66	63.00	1375.00
RETURNS				
Yield Obtained	28.25	8.32	5.00	53.00
Expected Market Price	7.78	0.51	6.90	9.00
GRIP, Crop and Hail Receipts	8.38	22.48	0.00	125.00
GROSS RETURNS	228.33	57.36	121.00	418.82
VARIABLE OPERATING COSTS				
Fertilizers	27.70	6.97	13.56	41.40
Herbicides	25.33	9.07	9.90	48.90
Pesticides	7.34	8.80	0.00	42.63
Seed-purchased	13.52	6.24	0.00	29.00
Seed-home grown	0.08	0.49	0.00	3.09
Fuel	7.83	2.58	0.00	16.48
Repairs-Machinery	8.12	4.81	1.36	26.93
Repairs-Buildings	1.25	1.15	0.00	4.92
Custom Work	4.33	4.58	0.00	16.75
Hired Labour	2.38	5.93	0.00	35.00
Hail/Crop Ins.	7.93	4.18	0.00	16.33
Grip Premiums	6.37	4.35	0.00	17.50
Other Operating	1.43	3.13	0.00	16.43
Int. on Operating	4.26	1.02	2.25	7.21
TOTAL VARIABLE OPERATING COSTS	117.87	28.10	62.31	199.41
FIXED COSTS				
Land Taxes	4.02	2.22	1.00	10.23
Land Rental	11.73	9.74	0.00	31.24
Depreciation				
-machinery	18.68	9.37	5.45	54.30
-buildings	3.48	2.35	0.48	11.71
Other fixed costs (hydro, phone, admin, etc)	3.69	2.08	0.00	10.21
TOTAL FIXED COSTS	41.59	11.73	24.99	78.09
TOTAL COSTS	159.46	31.24	101.65	240.16
NET INCOME	68.86	49.45	-17.66	228.16
LESS INVESTMENT COST :				
-Machinery	11.33	6.03	2.48	32.61
-Buildings	4.19	2.92	0.58	14.06
-Land	19.34	11.14	0.93	44.21
TOTAL INVESTMENT COSTS	34.85	15.96	4.19	75.13
RETURN TO LABOUR & MANAGEMENT	34.01	54.12	-56.50	186.66
Break-even Yield Analysis				
Operating Costs	15.14			
Operating + Fixed Costs	20.49			
Expected yield under normal weather conditions	30.84	7.15	0.59	45.00

Table 6: Per Acre Budget for Flax

	Average	Standard Deviation	Min	Max
Number of acres	203.22	117.53	46.00	499.00
RETURNS				
Yield Obtained	21.22	8.43	7.09	41.00
Expected Market Price	7.22	0.55	6.41	9.00
GRIP, Crop and Hail Receipts	12.68	21.18	0.00	60.00
GROSS RETURNS	165.52	46.24	89.74	287.00
VARIABLE OPERATING COSTS				
Fertilizers	19.94	4.85	6.19	27.34
Herbicides	22.55	5.19	17.30	36.15
Pesticides	0.00	0.00	0.00	0.00
Seed-purchased	6.15	4.51	0.00	13.34
Seed-home grown	2.25	3.53	0.00	9.00
Fuel	8.36	2.11	6.00	14.71
Repairs-Machinery	8.65	5.46	2.50	26.93
Repairs-Buildings	1.50	1.54	0.00	5.00
Custom Work	3.38	4.47	0.00	14.20
Hired Labour	2.62	3.87	0.00	12.62
Hail/Crop Ins.	4.76	3.59	0.00	13.34
Grip Premiums	8.26	4.99	0.00	16.82
Other Operating	0.62	1.01	0.00	3.50
Int. on Operating	3.34	0.42	2.42	4.03
TOTAL VARIABLE OPERATING COSTS	92.36	11.52	67.03	111.56
FIXED COSTS				
Land Taxes	4.30	2.65	1.15	10.23
Land Rental	11.18	9.92	0.00	31.40
Depreciation				
-machinery	16.72	10.49	5.45	54.30
-buildings	4.39	2.63	0.65	11.71
Other fixed costs (hydro, phone, admin, etc)	3.91	1.88	0.61	8.58
TOTAL FIXED COSTS	40.50	10.25	26.94	72.51
TOTAL COSTS	132.86	14.92	96.83	155.08
NET INCOME	32.66	46.31	-33.01	145.22
LESS INVESTMENT COST :				
-Machinery	9.97	6.33	2.48	32.61
-Buildings	5.12	3.25	0.78	14.06
-Land	20.52	14.57	0.64	50.14
TOTAL INVESTMENT COSTS	35.62	19.90	4.19	75.13
RETURN TO LABOUR & MANAGEMENT	-2.96	43.58	-80.39	103.72
Break-even Yield Analysis				
Operating Costs	12.79			
Operating + Fixed Costs	18.40			
Expected yield under normal weather conditions	25.65	3.81	20.00	37.00

Table 7: Per Acre Budget for Lentils

	Average	Standard Deviation	Min	Max
Number of acres	94.40	34.54	58.00	150.00
RETURNS				
Yield Obtained	697.40	719.02	100.00	1900.00
Expected Market Price	0.15	0.04	0.10	0.20
GRIP, Crop and Hail Receipts	84.66	81.67	0.00	183.22
GROSS RETURNS	207.28	98.55	144.00	380.00
VARIABLE OPERATING COSTS				
Fertilizers	12.63	7.07	6.30	24.41
Herbicides	33.80	11.98	20.00	49.89
Pesticides	2.66	5.95	0.00	13.31
Seed-purchased	15.93	1.29	15.00	18.21
Seed-home grown	0.00	0.00	0.00	0.00
Fuel	7.18	2.02	5.00	9.29
Repairs-Machinery	7.67	2.07	4.21	9.53
Repairs-Buildings	1.10	1.47	0.00	3.12
Custom Work	4.81	5.12	0.00	12.11
Hired Labour	0.00	0.00	0.00	0.00
Hail/Crop Ins.	12.23	3.76	5.78	14.97
Grip Premiums	12.13	3.14	6.71	14.69
Other Operating	2.90	4.90	0.00	11.30
Int. on Operating	4.24	0.56	3.33	4.79
TOTAL VARIABLE OPERATING COSTS	117.28	15.57	92.04	132.39
FIXED COSTS				
Land Taxes	4.31	2.76	1.80	7.38
Land Rental	19.05	12.80	0.00	31.24
Depreciation				
-machinery	20.69	6.55	10.64	26.68
-buildings	2.72	0.76	1.85	3.76
Other fixed costs (hydro, phone, admin, etc)	5.73	2.71	3.10	10.21
TOTAL FIXED COSTS	52.50	16.63	39.64	78.09
TOTAL COSTS	169.78	28.90	135.15	210.48
NET INCOME	37.50	110.26	-59.70	225.13
LESS INVESTMENT COST :				
-Machinery	12.42	3.94	6.38	16.01
-Buildings	3.27	0.91	2.22	4.51
-Land	18.40	5.98	12.26	25.28
TOTAL INVESTMENT COSTS	34.09	9.31	22.47	44.39
RETURN TO LABOUR & MANAGEMENT	3.41	108.36	-104.09	182.66
Break-even Yield Analysis				
Operating Costs	805.49			
Operating + Fixed Costs	1166.09			
Expected yield under normal weather conditions	1420.00	216.79	1200.00	1700.00

Table 8: Per Acre Budget for Oats

	Average	Standard Deviation	Min	Max
Number of acres	125.94	64.16	10.00	235.00
RETURNS				
Yield Obtained	83.06	21.58	26.00	121.00
Expected Market Price	1.54	0.13	1.25	1.65
GRIP, Crop and Hail Receipts	3.64	12.19	0.00	49.50
GROSS RETURNS	132.84	30.52	44.88	181.50
VARIABLE OPERATING COSTS				
Fertilizers	22.14	8.84	0.00	37.80
Herbicides	5.73	2.78	3.00	15.00
Pesticides	0.00	0.00	0.00	0.00
Seed-purchased	5.29	3.95	0.00	9.53
Seed-home grown	1.72	2.72	0.00	7.50
Fuel	8.82	2.70	4.43	14.71
Repairs-Machinery	9.26	7.11	1.50	31.60
Repairs-Buildings	0.94	0.89	0.00	2.78
Custom Work	2.34	3.52	0.00	12.20
Hired Labour	3.91	8.52	0.00	35.00
Hail/Crop Ins.	3.42	2.47	0.00	7.00
Grip Premiums	3.85	3.18	0.00	11.75
Other Operating	0.77	1.11	0.00	3.50
Int. on Operating	2.56	0.72	1.14	4.15
TOTAL VARIABLE OPERATING COSTS	70.75	19.93	31.46	114.81
FIXED COSTS				
Land Taxes	4.42	2.31	1.07	9.00
Land Rental	8.95	10.31	0.00	29.55
Depreciation				
-machinery	16.03	5.81	5.71	25.50
-buildings	3.47	2.38	0.42	9.41
Other fixed costs (hydro, phone, admin, etc)	3.31	1.85	0.61	7.24
TOTAL FIXED COSTS	36.18	9.94	20.14	60.64
TOTAL COSTS	106.93	23.77	51.60	155.56
NET INCOME	25.91	27.72	-28.06	61.44
LESS INVESTMENT COST :				
-Machinery	9.55	3.46	3.43	15.30
-Buildings	4.17	2.85	0.50	11.29
-Land	22.15	14.20	2.09	50.14
TOTAL INVESTMENT COSTS	35.87	16.76	10.70	63.60
RETURN TO LABOUR & MANAGEMENT	-9.96	28.92	-79.96	27.63
Break-even Yield Analysis				
Operating Cost	46.01			
Operating Cost + Fixed Cost	69.54			
Expected yield under normal weather conditions	89.01	30.89	1.09	150.00

Table 9: Per Acre Budget for Peas

	Average	Standard Deviation	Min	Max
Number of acres	176.71	120.48	55.00	330.00
RETURNS				
Yield Obtained	29.43	11.70	11.00	45.00
Expected Market Price	5.84	1.21	4.70	7.50
GRIP, Crop and Hail Receipts	11.32	26.10	0.00	70.00
GROSS RETURNS	180.38	50.09	126.90	245.52
VARIABLE OPERATING COSTS				
Fertilizers	9.26	2.81	6.00	14.00
Herbicides	19.07	5.34	7.51	23.00
Pesticides	3.49	5.40	0.00	12.50
Seed-purchased	23.38	5.34	12.39	27.74
Seed-home grown	1.83	4.85	0.00	12.82
Fuel	7.91	1.46	5.00	9.26
Repairs-Machinery	9.55	2.70	6.50	13.24
Repairs-Buildings	1.05	0.98	0.16	3.12
Custom Work	3.24	4.07	0.00	8.43
Hired Labour	2.39	4.77	0.00	12.62
Hail/Crop Ins.	5.27	3.32	0.00	10.04
Grip Premiums	8.58	1.12	6.71	9.88
Other Operating	3.29	4.84	0.00	11.30
Int. on Operating	3.69	0.39	3.13	4.14
TOTAL VARIABLE OPERATING COSTS	102.03	10.77	86.66	114.63
FIXED COSTS				
Land Taxes	5.08	2.55	1.74	7.43
Land Rental	9.73	10.88	0.00	31.24
Depreciation				
-machinery	23.48	7.62	14.87	37.41
-buildings	3.42	2.53	0.74	7.71
Other fixed costs (hydro, phone, admin, etc)	4.06	3.00	1.66	10.21
TOTAL FIXED COSTS	45.77	18.43	28.80	78.09
TOTAL COSTS	147.80	26.93	115.46	189.47
NET INCOME	32.58	45.47	-16.91	113.80
LESS INVESTMENT COST :				
-Machinery	14.96	6.56	8.92	28.52
-Buildings	4.39	3.47	0.89	9.47
-Land	24.15	15.18	6.42	50.04
TOTAL INVESTMENT COSTS	43.50	19.40	17.68	73.20
RETURN TO LABOUR & MANAGEMENT	-10.92	52.50	-79.68	71.33
Break-even Yield Analysis				
Operating Costs				
Operating + Fixed Costs				
Expected yield under normal weather conditions	36.14	5.40	30.00	45.00

Table 10: Per Acre Budget for Sunflowers

	Average	S.D.	Min	Max
Number of acres	138.22	77.05	54.00	300.00
RETURNS				
Yield Obtained	1501.44	409.35	956.00	2105.00
Expected Market Price	0.16	0.02	0.14	0.18
GRIP, Crop and Hail Receipts	2.44	7.33	0.00	22.00
GROSS RETURNS	240.91	74.55	136.71	372.96
VARIABLE OPERATING COSTS				
Fertilizers	25.20	6.85	17.55	33.25
Herbicides	16.76	8.92	5.18	28.70
Pesticides	3.68	2.38	0.00	6.75
Seed-purchased	21.98	11.74	9.30	50.00
Seed-home grown	0.00	0.00	0.00	0.00
Fuel	9.38	2.35	6.50	14.51
Repairs-Machinery	7.15	2.89	3.87	13.24
Repairs-Buildings	1.21	0.63	0.42	2.20
Custom Work	4.47	5.33	0.00	16.75
Hired Labour	1.91	4.29	0.00	12.62
Hail/Crop Ins.	4.28	2.59	0.00	7.44
Grip Premiums	8.36	5.31	0.00	16.75
Other Operating	0.88	1.08	0.00	2.50
Int. on Operating	3.95	0.73	2.82	5.20
TOTAL VARIABLE OPERATING COSTS	109.22	20.19	78.06	143.83
FIXED COSTS				
Land Taxes	4.54	3.26	1.00	10.23
Land Rental	12.20	13.28	0.00	31.40
Depreciation				
-machinery	16.04	7.07	5.45	27.47
-buildings	3.61	2.12	0.65	7.71
Other fixed costs (hydro, phone, admin, etc)	4.38	1.79	2.00	7.24
TOTAL FIXED COSTS	40.76	11.24	28.31	60.64
TOTAL COSTS	149.98	24.93	106.37	194.39
NET INCOME	90.92	75.46	-22.10	217.55
LESS INVESTMENT COST :				
-Machinery	9.55	4.38	2.48	16.42
-Buildings	4.18	2.60	0.78	9.25
-Land	22.67	19.16	0.64	50.14
TOTAL INVESTMENT COSTS	36.39	23.62	4.19	73.20
RETURN TO LABOUR & MANAGEMENT	54.54	69.73	-50.34	173.40
Break-even Yield Analysis				
Operating Costs	690.78			
Operating + Fixed	948.59			
Expected yield under normal weather conditions	1616.67	290.47	1250.00	2000.00

Table 11: Per Acre Budget for Tame Hay

	Average	Standard Deviation	Min	Max
Number of acres	210.56	170.17	30.00	535.00
RETURNS				
Yield Obtained	1.77	0.37	1.40	2.50
Expected Market Price	44.80	13.20	25.00	65.00
GRIP, Crop and Hail Receipts	0.00	0.00	0.00	0.00
GROSS RETURNS	79.00	27.19	41.50	115.00
VARIABLE OPERATING COSTS				
Fertilizers	2.09	4.15	0.00	9.91
Herbicides	0.00	0.00	0.00	0.00
Pesticides	0.00	0.00	0.00	0.00
Seed-purchased	0.00	0.00	0.00	0.00
Seed-home grown	0.00	0.00	0.00	0.00
Fuel	3.23	3.66	0.00	10.38
Repairs-Machinery	5.29	5.39	0.00	14.29
Repairs-Buildings	1.02	1.23	0.00	3.57
Custom Work	9.76	14.15	0.00	37.00
Hired Labour	2.14	2.70	0.00	7.00
Hail/Crop Ins.	0.00	0.00	0.00	0.00
Grip Premiums	0.00	0.00	0.00	0.00
Other Operating	3.41	6.86	0.00	21.00
Int. on Operating	1.01	0.56	0.00	1.62
TOTAL VARIABLE OPERATING COSTS	27.95	15.42	0.00	44.74
FIXED COSTS				
Land Taxes	4.77	2.55	1.20	9.00
Land Rental	6.86	6.65	0.00	15.00
Depreciation				
-machinery	18.23	13.90	8.52	54.30
-buildings	3.12	1.89	0.42	5.68
Other fixed costs (hydro, phone, admin, etc)	3.79	2.38	0.00	7.24
TOTAL FIXED COSTS	36.76	14.43	20.14	72.51
TOTAL COSTS	64.71	15.35	31.22	78.52
NET INCOME	14.29	27.16	-31.01	45.94
LESS INVESTMENT COST :				
-Machinery	10.88	8.36	5.11	32.61
-Buildings	3.77	2.31	0.50	6.82
-Land	22.65	15.96	2.49	50.14
TOTAL INVESTMENT COSTS	37.30	22.38	12.04	75.13
RETURN TO LABOUR & MANAGEMENT	-23.01	35.84	-106.14	18.22
Break-even Yield Analysis				
Operating Costs	0.62			
Operating + Fixed Costs	1.44			
Expected yield under normal weather conditions	2.12	0.37	1.50	2.50

Table 12: Per Acre Budget for Hard Red Spring Wheat

	Average	Standard Deviation	Min	Max
Number of acres	408.97	460.55	50.00	2810.00
RETURNS				
Yield Obtained	34.64	19.33	5.00	139.98
Expected Market Price	3.99	0.69	0.82	5.50
GRIP, Crop and Hail Receipts	13.83	26.16	0.00	122.75
GROSS RETURNS	143.14	32.70	49.35	220.00
VARIABLE OPERATING COSTS				
Fertilizers	22.89	7.20	0.00	35.63
Herbicides	11.68	5.51	3.25	22.45
Pesticides	0.08	0.44	0.00	2.66
Seed-purchased	5.94	4.96	0.00	15.45
Seed-home grown	2.62	3.57	0.00	10.29
Fuel	8.42	2.60	4.43	16.48
Repairs-Machinery	8.58	5.38	1.36	31.60
Repairs-Buildings	1.19	1.13	0.00	4.92
Custom Work	2.33	2.89	0.00	12.20
Hired Labour	2.66	6.24	0.00	35.00
Hail/Crop Ins.	3.94	2.51	0.00	10.14
Grip Premiums	9.37	3.91	0.00	17.10
Other Operating	0.80	1.91	0.00	11.30
Int. on Operating	3.02	0.68	1.53	5.03
TOTAL VARIABLE OPERATING COSTS	83.52	18.69	42.46	139.19
FIXED COSTS				
Land Taxes	4.53	2.45	1.07	10.23
Land Rental	10.72	10.52	0.00	31.40
Depreciation				
-machinery	19.05	9.50	5.45	54.30
-buildings	3.71	2.49	0.42	11.71
Other fixed costs (hydro, phone, admin, etc)	3.95	2.11	0.61	10.21
TOTAL FIXED COSTS	41.97	12.09	20.14	78.09
TOTAL COSTS	125.49	22.87	62.60	179.94
NET INCOME	17.64	30.04	-56.65	91.37
LESS INVESTMENT COST :				
-Machinery	11.56	6.12	2.48	32.61
-Buildings	4.32	3.17	0.00	14.06
-Land	20.49	13.71	0.64	50.14
TOTAL INVESTMENT COSTS	36.36	18.57	4.19	75.13
RETURN TO LABOUR & MANAGEMENT	-18.72	34.25	-101.04	73.69
Break-even Yield Analysis				
Operating Costs	20.95			
Operating + Fixed Costs	31.47			
Expected yield under normal weather conditions	38.41	9.47	0.98	55.00

Table 13: Per Acre Budget for Feed Wheat

	Average	Standard Deviation	Min	Max
Number of acres	249.90	144.32	75.00	500.00
RETURNS				
Yield Obtained	40.08	8.33	22.74	56.00
Expected Market Price	3.66	0.45	2.97	4.20
GRIP, Crop and Hail Receipts	7.01	22.16	0.00	70.08
GROSS RETURNS	153.95	16.08	130.00	173.25
VARIABLE OPERATING COSTS				
Fertilizers	20.76	4.34	15.00	26.93
Herbicides	12.77	6.68	5.00	25.66
Pesticides	0.27	0.84	0.00	2.66
Seed-purchased	8.99	4.28	0.00	15.56
Seed-home grown	0.45	1.42	0.00	4.50
Fuel	6.67	1.73	4.43	10.46
Repairs-Machinery	8.12	7.13	1.36	26.93
Repairs-Buildings	1.68	1.30	0.00	4.28
Custom Work	1.46	1.90	0.00	4.06
Hired Labour	2.73	4.26	0.00	10.90
Hail/Crop Ins.	3.10	2.34	0.00	6.67
Grip Premiums	9.41	2.67	5.40	14.90
Other Operating	0.49	1.01	0.00	3.20
Int. on Operating	2.88	0.72	1.78	3.94
TOTAL VARIABLE OPERATING COSTS	79.78	20.03	49.24	109.08
FIXED COSTS				
Land Taxes	3.75	2.94	1.00	10.23
Land Rental	10.11	9.82	0.00	29.05
Depreciation				
-machinery	18.11	7.45	9.85	28.12
-buildings	3.28	1.72	0.48	6.25
Other fixed costs (hydro, phone, admin, etc)	3.59	1.43	2.12	6.15
TOTAL FIXED COSTS	38.84	6.11	28.31	49.02
TOTAL COSTS	118.61	21.13	89.66	152.08
NET INCOME	35.33	28.85	-12.08	83.59
LESS INVESTMENT COST :				
-Machinery	10.86	4.45	5.91	16.88
-Buildings	3.94	2.07	0.58	7.50
-Land	18.38	9.23	4.21	30.23
TOTAL INVESTMENT COSTS	33.18	12.66	10.70	49.81
RETURN TO LABOUR & MANAGEMENT	2.16	28.05	-52.04	33.78
Break-even Yield Analysis				
Operating Costs	21.78			
Operating + Fixed Costs	32.38			
Expected yield under normal weather conditions	43.60	18.45	1.03	65.00

Table 14: Per Acre Budget for Durum Wheat

	Average	Standard Deviation	Min	Max
Number of acres	334.80	204.61	54.00	540.00
RETURNS				
Yield Obtained	35.24	8.68	30.00	50.00
Expected Market Price	4.21	0.71	3.26	5.00
GRIP, Crop and Hail Receipts	2.00	4.47	0.00	10.00
GROSS RETURNS	151.70	53.54	118.01	242.00
VARIABLE OPERATING COSTS				
Fertilizers	16.16	3.49	13.56	22.30
Herbicides	13.15	4.09	9.50	19.00
Pesticides	0.10	0.22	0.00	0.50
Seed-purchased	8.64	5.09	0.00	12.38
Seed-home grown	1.80	4.02	0.00	9.00
Fuel	6.54	1.49	5.00	8.64
Repairs-Machinery	6.63	4.33	2.00	13.14
Repairs-Buildings	0.92	1.26	0.00	3.12
Custom Work	1.76	2.94	0.00	6.78
Hired Labour	0.83	1.85	0.00	4.13
Hail/Crop Ins.	5.34	1.99	3.10	7.41
Grip Premiums	9.94	2.43	7.75	12.79
Other Operating	0.20	0.45	0.00	1.00
Int. on Operating	2.70	0.59	1.99	3.27
TOTAL VARIABLE OPERATING COSTS	74.70	16.24	54.99	90.54
FIXED COSTS				
Land Taxes	3.74	2.08	1.92	7.25
Land Rental	13.13	9.58	0.00	27.00
Depreciation				
-machinery	22.56	9.47	14.87	37.41
-buildings	3.01	2.06	0.89	6.21
Other fixed costs (hydro, phone, admin, etc)	3.18	1.72	1.00	5.25
TOTAL FIXED COSTS	45.63	10.82	33.83	62.91
TOTAL COSTS	120.33	20.81	102.24	153.45
NET INCOME	31.37	50.75	-2.22	121.18
LESS INVESTMENT COST :				
-Machinery	14.76	8.17	8.92	28.52
-Buildings	4.01	3.29	1.07	9.47
-Land	13.95	8.27	4.42	24.00
TOTAL INVESTMENT COSTS	32.72	17.19	14.71	55.89
RETURN TO LABOUR & MANAGEMENT	-1.35	62.15	-49.34	103.50
Break-even Yield Analysis				
Operating Cost	17.74			
Operating + Fixed Costs	28.58			
Expected yield under normal weather conditions	36.56	4.34	30.00	40.80

