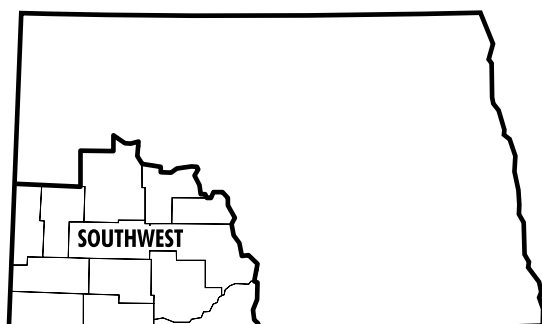




FARM MANAGEMENT PLANNING GUIDE

December 2019

Projected 2020 Crop Budgets



South West North Dakota

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The 2020 crop budgets provide an estimate of revenues and costs for selected crops. Each set of budgets are developed for a multi-county region. There is considerable variation in soil type and productivity, weather conditions, as well as management and production practices within each region. Therefore, **THESE BUDGETS ARE ONLY INTENDED TO BE USED AS A GUIDE. EVERY INDIVIDUAL IS HIGHLY ENCOURAGED TO DEVELOP HIS/HER OWN BUDGETS!**

The profitability budget accounts for full economic opportunity costs for land and machinery investment, regardless of farm operator equity position. The bottom line is the return to labor and management. This is the expected “payment” to the producer for the labor and managerial efforts required by the crop enterprise. Each individual must make the decision whether it is sufficient.

The budget can be changed to conform to the more common definition of accounting profit (return to unpaid labor and management, and owner equity) by

replacing the machinery investment and land charge cost items with your per acre interest and rental expense of machinery and land, and real estate tax if land is owned.

The budget can be used for long run decisions if the revenues and costs are realistic for several years. (Crop prices, direct costs, and the land charge are best estimates for only the 2020 crop year, but crop yields are historic averages and machinery ownership costs are an average for the total length of ownership). If the budget shows a high return to labor and management, and is representative for several years, increased acreage and corresponding investment should be considered. However, if long-run returns to labor and management are unsatisfactory the best decision may be to exit the crop enterprise and employ the machinery and land investment, and labor and management, in a different enterprise or investment.

For short-run planning decisions you can omit the indirect costs if the land and machinery required to produce the different enterprises are in place. Simply compare the crop enterprises by calculating return over direct costs. Labor requirements and risk should also be considered. Insurance is not available for some crops.

NDSU

EXTENSION

The budget can be used to estimate cashflow by making a few modifications. Machinery depreciation should be omitted and the machinery investment number replaced with your per acre principal and interest payment on machinery debt. For owned land, the land charge should be replaced with your per acre real estate tax and principal and interest payment on land debt.

The 2018 Farm Bill continues the Price Loss Coverage (PLC) and Agricultural Risk Coverage (ARC) support programs. PLC and ARC payments have been omitted from the budgets because those payments, if any, are tied to historic farm program base acres, not to current crop selection or production.

Primary Assumptions:

Crops are planted on dryland recrop ground. Costs of moving crop to local market/storage are included.

The budgets for the South West, North West, South Central and North Central regions typically represent production systems where soil disturbance only occurs at seeding.

Market Price: Best estimates of NDSU extension economists. The greater of projected market price and marketing loan rate is used.

Market Yields: Average yield for the 7 year period 2012-2018, after the low and high yield years are removed. Yields for safflower, yellow mustard, buckwheat, millet, rye and chickpeas are from NDSU extension agronomists and industry sources.

Fertilizer: Cost of fertilizer applied, based on soil test, to meet yield goal. N fertilizer can be reduced if previous crop was soybean, dry bean, field peas or lentil.

Soil test - recrop:
 Nitrogen - 38 lb
 Phosphorus - 10 ppm
 Potassium - 356 ppm

Fertilizer prices:
 Nitrogen - .37/lb
 Phosphorus - .36/lb
 Potassium - .31/lb

Seed Prices:

Spring Wheat	10.25/bu
Durum	11.75/bu
Barley	8.25/bu
Corn GM	2.69/thou.kern.
Soybean GM	.34/thou.kern.
Oil Sunflower	1.55/thou.kern.
Conf. Sunflower	2.75/thou.kern.
Canola	11.30/lb
Flax	17.50/bu
Field Peas	14.00/bu
Oats	6.25/bu
Lentils	.30/lb
Mustard	2.10/lb
Safflower	.45/lb
Buckwheat	.40/lb
Millet	.35/lb
Large Chickpeas	.40/lb
Winter Wheat	9.00/bu
Rye	8.00/bu

Fuel prices:

Diesel	2.45/gal
Gas	2.45/gal

Lubrication charge: 15% of fuel cost

Crop Insurance: Revenue Protection was used for all wheat, barley, soybeans, corn, canola, sunflowers, field peas, dry beans and lentils with a 75% coverage level and enterprise units. APH insurance was used for other crops for which 70% coverage and optional units were assumed.

Miscellaneous: soil testing, machinery rent and custom work.

Operating Interest: Direct costs charged 5.4% interest for 6 month period.

Misc. Overhead: Machinery housing and insurance at .5% and .85%, respectively, of average machinery investment. Also, liability insurance and license fees of trucks. In addition, \$4.00 per acre is assumed for general farm utilities, farm publications, meetings, dues, income tax preparation, legal fees, etc.

Land charge = average cash rent.

Machinery investment: 4.5% real interest rate, over the years of machine ownership, is charged on average machinery investment. The real, or inflation adjusted, rate is the commercial rate minus the inflation rate. Ave. mach. investment = (Purchase price + Disposal price)/2

Depreciation = (Purchase price - disposal price / years ownership)

Spring Wheat

Durum

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	42	_____	41	_____
Market Price	4.94	_____	5.46*	_____
MARKET INCOME	207.48	_____	223.86	_____
DIRECT COSTS				
-Seed	15.38	_____	20.56	_____
-Herbicides	25.80	_____	25.80	_____
-Fungicides**	5.00	_____	5.00	_____
-Insecticides***	0.00	_____	0.00	_____
-Fertilizer	42.08	_____	40.74	_____
-Crop Insurance	5.00	_____	6.50	_____
-Fuel & Lubrication	11.30	_____	11.25	_____
-Repairs	16.30	_____	16.27	_____
-Drying	0.00	_____	0.00	_____
-Miscellaneous	8.00	_____	8.00	_____
-Operating Interest	3.48	_____	3.62	_____
SUM OF LISTED DIRECT COSTS	132.34	=====	137.75	=====
INDIRECT (FIXED) COSTS				
-Misc. Overhead	7.62	_____	7.61	_____
-Machinery Depreciation	19.25	_____	19.20	_____
-Machinery Investment	10.62	_____	10.59	_____
-Land Charge	38.00	_____	38.00	_____
SUM OF LISTED INDIRECT COSTS	75.49	=====	75.39	=====
SUM OF ALL LISTED COSTS	207.83	_____	213.14	_____
RETURN TO LABOR & MANAGEMENT	(0.35)	_____	10.72	_____
LISTED COSTS PER BUDGET UNIT	(bu):		(bu):	
-Direct Costs	3.15	_____	3.36	_____
-Indirect Costs	1.80	_____	1.84	_____
-Total Costs	4.95	_____	5.20	_____

Wheat notes:

*Durum price is for milling quality. There is risk of lower quality and lower price.

**Includes seed treatment and early season foliar fungicide. Although late season fungicides are often not common in this region, prothioconazole, metconazole, or pydiflumetofen containing products are recommended for fusarium head blight (scab) control when conditions are favorable for infection.

***Cereal grain aphid insecticide would cost about \$4.

Malting Barley

Corn Grain

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	57	_____	89	_____
Market Price	3.39*	_____	3.35	_____
MARKET INCOME	193.23	_____	298.15	_____
DIRECT COSTS				
-Seed	11.14	_____	61.87*	_____
-Herbicides	24.30	_____	21.00	_____
-Fungicides	5.00**	_____	0.00	_____
-Insecticides	0.00	_____	0.00	_____
-Fertilizer	32.79	_____	45.75	_____
-Crop Insurance	5.50	_____	10.00**	_____
-Fuel & Lubrication	12.11	_____	15.41	_____
-Repairs	16.73	_____	19.96	_____
-Drying	0.00	_____	16.02	_____
-Miscellaneous	8.00	_____	8.00	_____
-Operating Interest	3.12	_____	5.35	_____
SUM OF LISTED DIRECT COSTS	118.70	=====	203.36	=====
INDIRECT (FIXED) COSTS				
-Misc. Overhead	7.91	_____	9.86	_____
-Machinery Depreciation	20.05	_____	30.36	_____
-Machinery Investment	11.04	_____	16.60	_____
-Land Charge	38.00	_____	38.00	_____
SUM OF LISTED INDIRECT COSTS	77.00	=====	94.82	=====
SUM OF ALL LISTED COSTS	195.70	_____	298.18	_____
RETURN TO LABOR & MANAGEMENT	(2.47)	_____	(0.03)	_____
LISTED COSTS PER BUDGET UNIT	(bu):		(bu):	
-Direct Costs	2.08	_____	2.28	_____
-Indirect Costs	1.35	_____	1.07	_____
-Total Costs	3.43	_____	3.35	_____

Barley notes:

*There is risk of not making malting barley quality. Use \$2.40 for feed barley.

**Includes seed treatment and early season foliar fungicide. Although late season fungicides are often not common in this region, prothioconazole, metconazole, or pydiflumetofen containing products are recommended for fusarium head blight (scab) control when conditions are favorable for infection.

Corn notes:

*GM corn with herbicide tolerance and above ground insect control traits.

**Crop insurance is only available in Billings county by written agreement.

Soybeans

Oil Sunflower

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	29	_____	1530	_____
Market Price	8.05	_____	0.173	_____
MARKET INCOME	233.45	_____	264.69	_____
DIRECT COSTS				
-Seed	62.40*	_____	32.55	_____
-Herbicides	20.00	_____	34.00	_____
-Fungicides	0.00	_____	0.00*	_____
-Insecticides	0.00	_____	5.00**	_____
-Fertilizer	1.96	_____	27.17	_____
-Crop Insurance	6.00**	_____	7.00	_____
-Fuel & Lubrication	11.17	_____	12.06	_____
-Repairs	16.59	_____	17.42	_____
-Drying	0.00	_____	4.59	_____
-Miscellaneous	5.00	_____	16.00	_____
-Operating Interest	3.32	_____	4.21	_____
SUM OF LISTED DIRECT COSTS	126.44	_____	160.00	_____
INDIRECT (FIXED) COSTS				
-Misc. Overhead	7.69	_____	8.22	_____
-Machinery Depreciation	20.30	_____	22.02	_____
-Machinery Investment	11.28	_____	12.40	_____
-Land Charge	38.00	_____	38.00	_____
SUM OF LISTED INDIRECT COSTS	77.27	_____	80.64	_____
SUM OF ALL LISTED COSTS	203.71	_____	240.64	_____
RETURN TO LABOR & MANAGEMENT	29.74	_____	24.05	_____
LISTED COSTS PER BUDGET UNIT	(bu):		(lb):	
-Direct Costs	4.36	_____	0.10	_____
-Indirect Costs	2.66	_____	0.05	_____
-Total Costs	7.02	_____	0.16	_____

Soybean notes:

*GM soybeans with herbicide tolerance. The cost includes \$8 for inoculant and fungicide treatment in addition to seed expense.

**Crop insurance is only available by written agreement in some counties of region.

Oil Sunflower notes:

*Fungicide for rust would cost \$4 plus application.

**One spraying for head feeding insects (red seed weevil, lygus bug and banded moths). Custom application cost of \$8 is under "Miscellaneous." Foliar applied insecticide for cutworms would cost about \$5 per acre plus application (usually tank mixed with herbicide).

Confection Sunflower

Canola

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	1420	_____	1710	_____
Market Price	0.242	_____	0.165	_____
MARKET INCOME	343.64	_____	282.15	_____
DIRECT COSTS				
-Seed	49.50	_____	56.50	_____
-Herbicides	36.20	_____	23.10	_____
-Fungicides	0.00*	_____	0.00*	_____
-Insecticides	10.00**	_____	0.00	_____
-Fertilizer	24.21	_____	55.12	_____
-Crop Insurance	16.50	_____	11.50	_____
-Fuel & Lubrication	11.87	_____	11.97	_____
-Repairs	17.32	_____	17.49	_____
-Drying	4.02	_____	0.00	_____
-Miscellaneous	24.00	_____	8.00	_____
-Operating Interest	5.23	_____	4.96	_____
	=====	=====	=====	=====
SUM OF LISTED DIRECT COSTS	198.85	_____	188.64	_____
INDIRECT (FIXED) COSTS				
-Misc. Overhead	8.16	_____	7.83	_____
-Machinery Depreciation	21.83	_____	21.43	_____
-Machinery Investment	12.30	_____	11.64	_____
-Land Charge	38.00	_____	38.00	_____
	=====	=====	=====	=====
SUM OF LISTED INDIRECT COSTS	80.28	_____	78.90	_____
SUM OF ALL LISTED COSTS	279.13	_____	267.55	_____
RETURN TO LABOR & MANAGEMENT	64.51	_____	14.60	_____
LISTED COSTS PER BUDGET UNIT	(lb):		(lb):	
-Direct Costs	0.14	_____	0.11	_____
-Indirect Costs	0.06	_____	0.05	_____
-Total Costs	0.20	_____	0.16	_____

Confection Sunflower notes:

*Fungicide for rust would cost \$4 plus application.

**Two sprayings for head feeding insects (red seed weevil, lygus bug and banded moths) at about \$5 per application. Each custom application cost of \$8 is under "Miscellaneous." Foliar applied insecticide for cutworms would cost about \$5 per acre plus application (usually tank mixed with herbicide).

Canola notes:

*Fungicide for white mold would cost about \$18 plus application.

Flax

Field Peas

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	21		34	
Market Price	9.06		5.70	
MARKET INCOME	190.26		193.80	
DIRECT COSTS				
-Seed	14.00		42.00	
-Herbicides	26.00		35.90	
-Fungicides	0.00		1.50	
-Insecticides	0.00		6.00*	
-Fertilizer	19.24		5.60	
-Crop Insurance	11.50		7.50	
-Fuel & Lubrication	11.54		11.85	
-Repairs	17.84		18.41	
-Drying	0.00		0.00	
-Miscellaneous	1.50		6.00	
-Operating Interest	2.74		3.64	
	=====	=====	=====	=====
SUM OF LISTED DIRECT COSTS	104.35		138.40	
INDIRECT (FIXED) COSTS				
-Misc. Overhead	7.82		8.06	
-Machinery Depreciation	21.32		22.55	
-Machinery Investment	12.00		12.33	
-Land Charge	38.00		38.00	
	=====	=====	=====	=====
SUM OF LISTED INDIRECT COSTS	79.15		80.93	
SUM OF ALL LISTED COSTS	183.50		219.33	
RETURN TO LABOR & MANAGEMENT	6.76		(25.53)	
LISTED COSTS PER BUDGET UNIT	(bu):		(bu):	
-Direct Costs	4.97		4.07	
-Indirect Costs	3.77		2.38	
-Total Costs	8.74		6.45	

Field Pea notes:

*Seed treatment for pea leaf weevil. Foliar insecticide for cutworms and/or pea aphids would cost about \$4 per acre plus application.

Oats

Lentils

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	66	_____	1370	_____
Market Price	2.27	_____	0.14	_____
MARKET INCOME	149.82	_____	191.80	_____
DIRECT COSTS				
-Seed	12.50	_____	21.00	_____
-Herbicides	10.60	_____	35.50*	_____
-Fungicides	0.00	_____	16.00**	_____
-Insecticides	0.00	_____	0.00***	_____
-Fertilizer	32.57	_____	3.76	_____
-Crop Insurance	12.50	_____	9.50	_____
-Fuel & Lubrication	14.06	_____	13.87	_____
-Repairs	18.56	_____	21.47	_____
-Drying	0.00	_____	0.00	_____
-Miscellaneous	8.00	_____	9.50	_____
-Operating Interest	2.94	_____	3.53	_____
	=====	=====	=====	=====
SUM OF LISTED DIRECT COSTS	111.72	_____	134.12	_____
INDIRECT (FIXED) COSTS				
-Misc. Overhead	8.64	_____	8.49	_____
-Machinery Depreciation	22.83	_____	26.15	_____
-Machinery Investment	13.16	_____	14.18	_____
-Land Charge	38.00	_____	38.00	_____
	=====	=====	=====	=====
SUM OF LISTED INDIRECT COSTS	82.63	_____	86.82	_____
SUM OF ALL LISTED COSTS	194.35	_____	220.95	_____
RETURN TO LABOR & MANAGEMENT	(44.53)	_____	(29.15)	_____
LISTED COSTS PER BUDGET UNIT	(bu):		(lb):	
-Direct Costs	1.69	_____	0.10	_____
-Indirect Costs	1.25	_____	0.06	_____
-Total Costs	2.94	_____	0.16	_____

Lentil notes:

*Includes pre-harvest dessicant.

**Fungicide treatment for ascochyta/anthracnose.

***Foliar insecticide for cutworms, pea aphids and/or grasshoppers would cost about \$4 per acre plus application.

Yellow Mustard

Safflower

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	800	_____	1050	_____
Market Price	0.30	_____	0.19	_____
MARKET INCOME	240.00	_____	199.50	_____
DIRECT COSTS				
-Seed	21.00	_____	8.10	_____
-Herbicides	20.20	_____	22.10	_____
-Fungicides	0.00	_____	18.00*	_____
-Insecticides	0.00	_____	0.00	_____
-Fertilizer	15.03	_____	14.95	_____
-Crop Insurance	25.50*	_____	15.00	_____
-Fuel & Lubrication	11.57	_____	10.44	_____
-Repairs	17.79	_____	16.54	_____
-Drying	0.00	_____	0.00	_____
-Miscellaneous	8.00	_____	8.00	_____
-Operating Interest	3.22	_____	3.05	_____
SUM OF LISTED DIRECT COSTS	122.30	=====	116.18	=====
INDIRECT (FIXED) COSTS				
-Misc. Overhead	7.88	_____	7.44	_____
-Machinery Depreciation	20.67	_____	18.83	_____
-Machinery Investment	12.45	_____	10.51	_____
-Land Charge	38.00	_____	38.00	_____
SUM OF LISTED INDIRECT COSTS	79.00	=====	74.79	=====
SUM OF ALL LISTED COSTS	201.31	_____	190.97	_____
RETURN TO LABOR & MANAGEMENT	38.69	_____	8.53	_____
LISTED COSTS PER BUDGET UNIT	(lb):		(lb):	
-Direct Costs	0.15	_____	0.11	_____
-Indirect Costs	0.10	_____	0.07	_____
-Total Costs	0.25	_____	0.18	_____

Yellow Mustard notes:

*Crop insurance is not available in some counties of the region.

Safflower notes:

*Fungicide for alternaria leaf spot.

Buckwheat

Millet

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	850	_____	1400	_____
Market Price	0.199	_____	0.075	_____
MARKET INCOME	169.15	_____	105.00	_____
DIRECT COSTS				
-Seed	20.00	_____	8.75	_____
-Herbicides	18.00	_____	9.60	_____
-Fungicides	0.00	_____	0.00	_____
-Insecticides	0.00	_____	0.00	_____
-Fertilizer	7.86	_____	12.45	_____
-Crop Insurance	7.50*	_____	0.00	_____
-Fuel & Lubrication	11.17	_____	12.00	_____
-Repairs	17.06	_____	17.46	_____
-Drying	0.00	_____	0.00	_____
-Miscellaneous	1.50	_____	8.00	_____
-Operating Interest	2.24	_____	1.84	_____
SUM OF LISTED DIRECT COSTS	85.34	=====	70.10	=====
INDIRECT (FIXED) COSTS				
-Misc. Overhead	7.70	_____	7.92	_____
-Machinery Depreciation	20.08	_____	20.80	_____
-Machinery Investment	11.69	_____	12.09	_____
-Land Charge	38.00	_____	38.00	_____
SUM OF LISTED INDIRECT COSTS	77.47	=====	78.82	=====
SUM OF ALL LISTED COSTS	162.81	_____	148.92	_____
RETURN TO LABOR & MANAGEMENT	6.34	_____	(43.92)	_____
LISTED COSTS PER BUDGET UNIT				
	(lb):		(lb):	
-Direct Costs	0.10	_____	0.05	_____
-Indirect Costs	0.09	_____	0.06	_____
-Total Costs	0.19	_____	0.11	_____

Buckwheat notes:

*Crop insurance is not available in most counties of the region.

Large Chickpea Winter Wheat

	Per Acre	Your Figures	Per Acre	Your Figures
Market Yield	1400		43*	
Market Price	0.16		4.18	
MARKET INCOME	224.00		179.74	
DIRECT COSTS				
-Seed	56.00		9.00	
-Herbicides	36.30		23.00	
-Fungicides	36.00*		9.00	
-Insecticides	0.00		0.00	
-Fertilizer	10.98		43.42	
-Crop Insurance	9.50		5.00	
-Fuel & Lubrication	14.29		11.17	
-Repairs	22.33		16.35	
-Drying	0.00		0.00	
-Miscellaneous	8.50		8.00	
-Operating Interest	5.24		3.37	
SUM OF LISTED DIRECT COSTS	199.14		128.31	
INDIRECT (FIXED) COSTS				
-Misc. Overhead	8.66		7.55	
-Machinery Depreciation	26.87		19.06	
-Machinery Investment	14.71		10.34	
-Land Charge	38.00		38.00	
SUM OF LISTED INDIRECT COSTS	88.23		74.95	
SUM OF ALL LISTED COSTS	287.37		203.26	
RETURN TO LABOR & MANAGEMENT	(63.37)		(23.52)	
LISTED COSTS PER BUDGET UNIT	(lb):		(bu):	
-Direct Costs	0.14		2.98	
-Indirect Costs	0.06		1.74	
-Total Costs	0.21		4.73	

Large Chickpea notes:

*Two fungicide treatments for ascochyta blight. Additional treatments may be necessary.

Winter Wheat notes:

*Yield is per harvested acre. There is some risk of acreage abandonment in spring.

Rye

	Per Acre	Your Figures
Market Yield	41	_____
Market Price	4.23	_____
MARKET INCOME	173.43	_____
DIRECT COSTS		
-Seed	9.60	_____
-Herbicides	6.50	_____
-Fungicides	0.00	_____
-Insecticides	0.00	_____
-Fertilizer	40.74	_____
-Crop Insurance	11.00	_____
-Fuel & Lubrication	10.84	_____
-Repairs	15.42	_____
-Drying	0.00	_____
-Miscellaneous	8.00	_____
-Operating Interest	2.76	_____
	=====	=====
SUM OF LISTED DIRECT COSTS	104.86	_____
INDIRECT (FIXED) COSTS		
-Misc. Overhead	7.45	_____
-Machinery Depreciation	18.51	_____
-Machinery Investment	10.07	_____
-Land Charge	38.00	_____
	=====	=====
SUM OF LISTED INDIRECT COSTS	74.03	_____
SUM OF ALL LISTED COSTS	178.89	_____
RETURN TO LABOR & MANAGEMENT	(5.46)	_____
LISTED COSTS PER BUDGET UNIT	(bu):	
-Direct Costs	2.56	_____
-Indirect Costs	1.81	_____
-Total Costs	4.36	_____

2020 Machinery List

Machine	Purch. Price	Annual Use	Years to trade	Trade in	Deprec.	Invest.	Repairs	Ac/hr
FWA 150HP Tractor	140800	400hr	20	44054	12.09 /hr	10.40 /hr	13.91 /hr	
FWA 190HP Tractor	185100	500hr	15	53163	17.59 /hr	10.72 /hr	18.30 /hr	
4WD 370HP Tractor	164000	500hr	15	75814	25.09 /hr	15.29 /hr	14.91 /hr	
SP Combine (base unit)	300200	250hr	12	72486	75.90 /hr	33.54 /hr	47.31 /hr	
Tandem Truck (used)	40600	150hr	15	12900	12.31 /hr	8.03 /hr	8.33 /hr	
Semi & Trailer (used)	47600	150hr	10	13500	22.73 /hr	9.17 /hr	10.33 /hr	
Pick-up Truck	34200	300hr	10	7900	8.77 /hr	3.16 /hr	3.92 /hr	
Swather 30 ft	31600	1000ac	20	7495	1.20 /ac	0.88 /ac	0.51 /ac	13.1
Sprayer 90 ft	40800	5000ac	10	20293	0.41 /ac	0.28 /ac	0.52 /ac	42.5
Heavy Harrow 70 ft	32600	2000ac	20	19004	0.34 /ac	0.58 /ac	0.36 /ac	39.7
Air Seeder 40 ft	186700	2400ac	10	95428	3.80 /ac	2.64 /ac	6.46 /ac	17.0
Planter 12-30	71100	800ac	20	23662	2.97 /ac	2.67 /ac	3.93 /ac	10.6
Corn head w/chopper	85400	800ac	12	24457	6.34 /ac	3.08 /ac	1.98 /ac	6.8
Grain head w/pu	19400	800ac	20	1873	1.09 /ac	0.60 /ac	0.30 /ac	10.2
Grain str. cut 35 ft	31900	1000ac	15	6646	1.68 /ac	0.87 /ac	0.42 /ac	11.9
Head w/sunf pans	38400	600ac	20	4016	2.86 /ac	1.59 /ac	0.51 /ac	11.9
Flex head 35 ft	46600	1000ac	20	4442	2.10 /ac	1.15 /ac	0.62 /ac	11.9
Rock picker	23400	50hr	20	7476	0.53 /ac	0.46 /ac	0.35 /ac	29.1
Grain Cart	37900	100hr	20	6400	15.75 /hr	9.97 /hr	8.90 /hr	
Grain auger	14000	50hr	20	800	13.20 /hr	6.66 /hr	5.20 /hr	

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