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Report 26

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UNIVERSITY OF MINNESOTA
Department of Agriculture
and
UNITED STATES DEPARTMENT OF AGRICULTURE
Bureau of Agricultural Economics
Cooperating

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FIRST ANNUAL REPORT
of the
Better Farming Club
of
Waseca County

By

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M.C. Hansen, County Agent

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Division of Farm Management and Agricultural Economics
University Farm
St. Paul, Minn.
March 1929

First Annual Report of the Waseca County Better Farming Club
for the year 1928

Prepared by W.P. Ranney and G.A. Bond

INDEX

	Page
Introduction.....	1
S Summary of Farm Earnings.....	4
Summary of Farm Inventories.....	5
Statement of Amount of Livestock.....	5
Statement of Gross Returns from Livestock.....	6
Statement of Expenses for Buildings, Machinery and Equipment.....	6
Statement of Miscellaneous Items.....	6
Effect of Well Balanced Efficiency on Farm Profits.....	7
Measures of Farm Organization and Management Efficiency.....	8
Factors of Cost in Dairy Production.....	12
Feed Costs and Returns from Dairy Cows.....	13
Feed Costs and Returns from Young Cattle.....	14
Feed Costs and Returns from Dairy Herd.....	15
Factors of Cost in Pork Production.....	16
Feed Costs and Returns from Poultry.....	17
Feed Costs for Horses.....	18

INTRODUCTION

The Division of Farm Management and Agricultural Economics and the Division of Agricultural Extension of the University of Minnesota, the Bureau of Agricultural Economics of the United States Department of Agriculture and twenty-nine farmers in Waseca County, Minnesota, have been cooperating during the year 1928 in a farm account project, known as the Better Farming Club of Waseca County.

The project has been under the direction of G.A. Bond of the Division of Farm Management and Agricultural Economics, University of Minnesota, with the assistance of other members of the same department: W.P. Ranney, one of the authors of this report; A.T. Hoverstad, who aided in the organization work late in the year 1927; and G.A. Sallce, who aided in closing the books at the end of the year, 1928. Hearty support and assistance has been rendered by M.C. Hansen, county agricultural agent of Waseca County. The work was started January 1, 1928, along with similar clubs in nearby counties, viz., Steele, Freeborn, Dodge, Rice and Goodhue counties.

Type of Farming in Waseca County

The farms selected for the study are livestock farms on which dairy cattle are the principal source of income. Cream for manufacture into butter is the principal dairy product sold. This is marketed through farmer owned cooperative creameries specializing in the manufacture of high quality butter. The skimmilk is retained on the farm and fed to hogs and poultry. These two classes of livestock are also an important source of income.

The principal crops grown are corn, oats, barley and hay. These crops are raised primarily as livestock feed altho a seasonal surplus may be sold. However, due to the short crops in 1927, more than the normal amount of feed was purchased in 1928. Wheat is grown to a limited extent as a cash crop, as are also sugar beets and canning crops. These farms are fairly typical of the system of dairy farming prevailing in southeastern Minnesota. This report shows that the receipts from the sales of dairy products constitute approximately one-third, and receipts from hog sales more than one-fourth of the average cash income for the 27 cooperators in Waseca County.

Records Kept

The records kept by the cooperators included inventories at the beginning and end of the year, cash receipts and expenses, a report of feed fed to the various classes of livestock, and a record of farm produce used by the farm family. Supplementary information was also secured during the year regarding crop and livestock production and practices.

The cooperators were assisted and supervised in keeping their records by the field agent, Mr. R.C. Bevan, who visited each farm in the six counties several times during the year. In addition to securing the supplementary information, the field agent's duties included numerous services, viz., securing of a monthly list of prices of farm products prevailing in the area, helping the farmer to place uniform values on real estate and equipment, checking the cash and feed records, and answering any questions that might arise as to how the entries should be made in the account book. The supervision resulted in uniformity in the type of records secured, in the inventory valuations and in the prices at which feed and farm produce were charged.

At the end of the year each farm was visited by a representative of the University who checked the records for completeness and accuracy. The books were then taken to the central office at University Farm, where every entry was again checked and omissions were noted. Any discrepancies found were referred back to the farmers for correction. This double checking insured a high degree of accuracy and completeness in each individual record.

Purpose of Project

The Better Farming Club renders assistance to the cooperators in keeping such records as will enable each operator to know the returns for his labor and management, the returns to capital and family labor, and the actual earnings from the farm that the family had to spend for living and personal use. The main purpose of the Club is to secure such data and information, which when compared with that secured on other farms will enable the cooperator to increase his efficiency in various enterprises and to organize his farm on a more profitable basis. For the latter purpose it was necessary for all of the cooperators, tenants as well as owner operators, to include the whole farm business in order that the results would be on a comparative basis. The earnings as shown in this report are computed on an owner basis for purposes of comparison, but each tenant was supplied a stato-

ment of his earnings on the basis of the rental system under which he was operating. Altho there is some variation in prices paid for feeds bought, uniform prices were used in making up the feed summaries and in placing values on the inventories of feed and farm products.

Analysis of the Farm Business

On page 4 is presented a financial summary of the year's business, showing the average results for the 27 farms on which the work was completed for the twelve months period, January 1, 1928 to December 31, 1928, and the high and low figure for each item. In the "your farm column" the results of each individual farm business is inserted in the copy sent to the farmer in order that he may compare his figures with the average.

The data on page and the remaining pages, which set up the ranking in the various measures of efficiency, should suggest to each cooperator some possibilities for improvement in his organization of the various enterprises and of his business as a whole. Altho each farm is an individual problem, and has its particular advantages and limitations, the type of farming is fairly uniform in the county and undoubtedly is adapted to the present general conditions. This study should bring out trends that may be taking place toward more profitable combinations of enterprises, and to the more efficient methods of management within the enterprises.

Capital Investment in Farm Business

The 27 farms in this report averaged 157 acres in size and had an average farm inventory of \$23,707, which does not include the value of the house in which the operator lived. Fifty-seven per cent of the average farm inventory consisted of land; 14 per cent of permanent improvements; 7 per cent of feeds and supplies; 7 per cent of all machinery and equipment; and 17 per cent of livestock, of which almost one-half or an average of \$1400 consists of the average cow inventory. The importance of cows is also brought out in a study of the sources of the operator's income.

Returns to Operators for Their Labor and Management

The average cash receipts per farm were \$4300. In addition farm produce to the value of \$330 was consumed by the farm family and there was an average inventory increase of \$381 per farm. The total average receipts per farm is the sum of these three items or \$5011. The average total expense per farm, \$2263, includes \$2150 cash expense and an estimated allowance of \$113 for the board of hired labor. The difference between the total income and total expense figures is \$2748. This is the return which the farmer receives for his own labor and management, the services of members of his family and the use of his capital. After deducting a charge of 5 per cent on the average inventory valuation, \$1185, for the services of capital there remains \$1563 for the services of the farmer and his family. The average value of family labor used, if computed at hired man's wages was \$218. The average operator's labor earning is the family earnings less his allowance of \$218, or \$1345. This is the return to the farmer for his labor and management over and above a 5 per cent return for his capital and going wages for other members of the family.

Summary of Farm Earnings, 1928 - Waseca County, Minnesota

CASH EXPENSES

	Your farm	Average	High farm	Low farm
Tractor (new & exp.)		\$105	\$1062	-
Truck (new & exp.)		21	150	-
Auto (new & exp.)(farm sh.) *		121	554	15
Gas engine(new & exp.)(farm sh.)		14	105	-
Light plant or bill(new & exp.)(farm sh.)		18	132	-
Machinery & equipment (new)		179	540	-
" " " (repair)		65	217	7
Bldgs., fences, tiling(new)		124	930	-
" " " (rep.)		56	238	-
Hired labor		251	924	-
All feed for livestock		495	2044	32
Other expense for livestock		50	186	6
Horses bought		36	353	-
Cows bought		31	425	-
Other cattle bought		38	316	-
Hogs bought		68	699	-
Poultry bought		56	385	-
Sheep bought		5	50	-
Crop (seed, twine, spray)		148	325	42
Taxes & insurance		240	442	102
General farm		29	117	5
(1) Total cash expense		2150	5765	470
(2) Decrease in farm inventory		-	1389	-
(3) Board for hired labor		113	260	3
(4) Total expense (1, 2 & 3)		2263	5774	470

CASH RECEIPTS

Horses		27	314	-
Cows		317	992	-
Dairy products		1414	3677	381
Other cattle		262	971	39
Sheep		83	604	-
Hogs		1122	2943	235
Poultry		192	1451	22
Eggs		373	3732	-
Small grain		189	2083	-
Corn		25	516	-
Hay		10	121	-
Root crops		-	-	-
Other crops		106	1014	-
Miscellaneous		76	370	-
Outside		104	727	-
(5) Total cash receipts		4300	11045	1380
(6) Increase in farm inventory		381	2673	66
(7) Farm produce used in house		330	648	110
(8) Total receipts (5, 6 & 7)		5011	11495	2016
Total expense (4)		2263	5772	470
(9) Return to capital & farm labor(8-4)		2748	6190	1359
(10) Interest on farm inventory		1185	1940	554
(11) Family labor earnings(9-10)		1563	4590	384
(12) Unpaid family labor		218	780	30
Operator labor earnings(11-12)		1345	4350	139

*Farm share based on farmer's estimate of amount used for farm purposes only.

Summary of Farm Inventories

Items	Your farm	Average	High farm	Low farm
Size of farm (acres) (1)		157	248	77
Size of farm business (prod. units)				
Average farm inventory (without house)		\$23707	\$38804	\$10688
Land		13603	22025	5200
Farm improvements		3244	7831	784
Machinery & equipment (total)		1728	-	-
Gen. mach. & equipment		1272	2878	406
Tractor		208	1050	125
Truck		31	213	20
Auto (farm share)		160	413	31
Gas engine (farm share)		36	145	5
Electric equipment (farm share)		21	141	34
Feeds and seeds		1618	3105	596
Miscellaneous supplies		14	54	2
Livestock (total)		3500	-	-
Horses		512	1465	233
Cows		1425	3620	373
Other cattle		659	2668	45
Hogs		566	1264	115
Sheep		121	736	51
Poultry		217	1195	25

Statement of the Amount of Livestock

Animal units (total) (2)	31.1	53.1	12.2
Cows	13.3	25.7	4.5
Other cattle	6.7	17.7	.3
Hogs	7.9	16.5	2.9
Sheep	1.6	10.6	.5
Poultry	1.6	9.3	.2
Pounds of pork produced	13,878	27,326	3,830
Horse units	5.9	9.	3.7
Crop acres per horse (with tractor)	20.6	37.	12.
Crop acres per horse (without tractor)	19.7	29.	12.

1. Productive man work units are a measure of size of business based on the average amount of man labor required per head of productive livestock and per acre of crops. They may also be used as a measure of labor efficiency. The units used were computed from data presented in Minn. Tech. Bul. 44, "A Study of Dairy Farm Organization in Southeastern Minnesota."
2. An animal unit represents an average mature horse, cow or the equivalent in other livestock, based upon the amount of feed eaten and manure produced.

Statement of Gross Returns from Livestock (3)

Item	Your farm	Average	High farm	Low farm
All productive livestock		\$4193	\$10807	\$1525
Cows		1712	4167	462
Other cattle		602	2601	114
Hogs		1186	2481	386
Sheep		98	677	-
Poultry		595	4971	85

Statement of Expenses for Buildings, Machinery and Equipment(4)

Buildings and fences		\$152	\$429	-
General machinery & equipment		194	440	4
Total power equipment		235	690	7
Tractor		62	282	-
Truck		32	232	1
Auto (farm share)		108	193	45
Gas engine (" ")		14	50	-
Electric equip. (" ")		19	120	7

Statement of Miscellaneous Items

Total farm power expense(5)		\$597	\$1275	\$210
Net increase in feeds and grains(6)		130	1874	-
Net decrease in horses(6)		28	153	-
Gross returns per \$100 exp.(7)		262	499	155

3. Gross Returns from livestock are the sum of cash receipts and farm products used in the house or on the farm, and adjusted for increases or decreases in inventory.
4. Expenses in connection with buildings and machinery are the cash expenses adjusted for increases or decreases in inventory, less any receipts from sales or hire.
5. Total farm power expense is a sum of tractor and truck expenses and farm share of auto, gas engine and electrical expenses, horse expense and horse feed cost. No attempt was made to allocate a part of the auto and truck expense to vehicles, or a part of the electrical expense to lighting farm buildings.
6. An increase in horses and in feeds and grain is calculated with gross returns, and a decrease with expenses.
7. In calculating gross returns per \$100 expense for the farm as a whole, any produce used on the farm is not included with gross returns. But all produce used in the house and any miscellaneous cash receipts are included. In addition to building and machinery costs mentioned in (3) above expenses include all other cash expenses, board for hired labor and unpaid family labor.

Utilization of Land and Yield of Crops - 1928

Crop	Number of farms growing this crop	Acres per Farm			Yield per Acre			
		Your farm	Average	Highest	Lowest	Your farm	Average	Highest
Wheat	3	.8	12.0	4.0	19.7	28.0	10.0	
Oats	17	10.7	52.0	2.0	45.6	70.0	29.0	
Barley	16	9.1	36	5	38.4	51.0	27.3	
Flax	6	2.3	22.0	2.0	7.3	11.8	3.0	
Wheat and oats	12	6.1	60.5	4.5	31.5	38.8	23.0	
Oats and barley	14	11.8	48.0	6.0	41.8	53.3	28.0	
Other grains and mixtures	6	2.7	31.0	2.0	-	-	-	
Total grain		43.5	74.5	14.0				
Corn, grain	27	31.3	81.0	11.0	40.7	55.5	14.3	
Corn, silage	18	7.5	20.0	6.0	7.5	12.1	5.3	
Corn, fodder	8	2.3	15.0	2.0	2.8	4.0	2.0	
Potatoes	12	.4	3.0	0.3	159.0	266.7	60.0	
Sugar beets	1	.7	18.0	-	13.9	13.9	-	
Total cultivated crops		42.2	92.0	13.0				
Alfalfa	24	8.1	20.0	2.0	2.8	5.0	1.0	
Clover & clover mixtures	8	2.5	18.0	3.0	1.6	3.3	0.4	
Other legumes	0	-	-	-	-	-	-	
Timothy	6	2.3	30.0	1.5	1.4	1.7	1.1	
Annual hay crops	5	1.0	7.0	2.0	2.1	2.8	1.5	
Wild hay	20	8.9	38.0	1.0	1.2	3.0	0.3	
Total hay		22.8	50.0	10.5				
Total crop acreage	27	108.5	171.0	46.0				
Pasture	27	37.9	132.5	7.7				
Timber(not pasture)	6	2.2	24.0	2.0				
Roads and waste	27	4.1	13.0	1.0				
Farmstead	27	5.5	12.0	2.5				
Total acres in farm		158.2	248.0	77.0				

EFFECT OF WELL BALANCED EFFICIENCY ON FARM PROFITS

It is quite evident from this report that few farmers have a monopoly on efficiency. Quite often farm operators show efficient management in one part of the farm business, which is offset by poor results in other phases of the business. These farmers get medium returns while those who fall down all along the line get the lowest returns, and those few who can manage a large volume of business with high all around efficiency are well paid for their labor and management.

To determine correctly the factors which have the most influence on farm earnings, some method of mathematical correlation should be used. Further studies will be made, as time permits, to determine the most important factors. However, data secured in the Steele County cost route 1920 to 1924 inclusive, and a careful observation of the data secured in this report indicate that the following factors have a noticeable effect on the farm earnings.

1. Pounds of butterfat per cow.
2. Index of gross returns for all productive livestock per \$100 of feed.
3. Number of productive livestock units per 100 acres.
4. Index of crop yield.
5. Index of productive man work units per worker.
6. Index of equipment and power expense (building, fencing, all machinery, horse feed and miscellaneous expense).
7. Size of business (total number of productive units).

In Chart 1 is shown the effect of the number of the above factors in which the farmer excels on his labor earnings. The two farmers who excelled in seven factors had average earnings of more than \$2000 above the average of the six farmers who excelled in only two factors.

Chart 1. Relation of Operator's Labor Earnings to the Number of Factors in which Farmer is above the Average in Efficiency.

Number of factors in which farm excels	Number of farms	Your farm	The length of the shaded lines are in proportion to the average operator's labor earnings	Operator's labor earnings
7	2		XXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXX	\$2868
6	5		XXXXXXXXXXXXXXXXXXXXXXXXXXXX	1873
5	5		XXXXXXXXXXXXXXXXXXXX	1342
4	6		XXXXXXXXXXXX	1093
3	7		XXXXXXXXXX	878
2	2		XXXXXXXX	798

The array in Chart 1 suggests that it will be worth while for each co-operator to study carefully his ranking on page 9, and note how he stands in respect to each of the above factors and other related factors and measures of efficiency. A further study of pages 12 to 18 may show him the reasons for his ranking in these various measures.

Each cooperator should bear in mind that the amount by which he is above or below the average may be as important as the number of factors in which he is high or low. For example the lowest man in respect to operator's labor earnings is just above the average in four factors, but is so far below the average in two factors that these offset the effect of the other four and reduce his earnings to the low point.

Measure of Farm Organization and Management Efficiency

Farm No.	Index of operator's earnings	Lbs. B.F. per cow	Returns per \$100 of Feed					No. cow units per 100 acres	Lbs. pork per feed crop acre	No. pro- ductive livestock units per 100 acres	Feed cost per A.U.of other cattle	Eggs per hen
			Cows	Hogs	Other cattle	Poultry	Sheep					
6192	323.4	249	132	96	137	119	-	19.5	224	40.2	\$55	192
6083	246.	206	116	74	249	157	147	6.8	170	20.2	30	74
6131	164.6	169	65	158	88	184	-	10.6	181	18.4	71	129
6231	144.6	247	103	80	67	121	31	7.3	73	25.1	63	56
6082	140.2	248	77	93	110	174	204	12.4	320	31.6	74	104
6061	137.6	236	144	136	142	87	-	8.9	181	17.6	54	82
6194	129.8	299	95	105	83	96	-	11.	181	21.4	65	188
6191	117.9	341	163	93	136	101	-	10.9	211	25.6	71	163
6022	111.6	335	118	79	136	26	27	7.5	177	17.6	54	77
6122	109.7	207	77	78	96	69	-	9.8	198	18.0	51	66
6051	99.3	315	79	62	351	108	-	9.9	178	18.2	49	116
6132	97.2	216	86	68	112	117	-	10.1	209	22.7	52	43
6031	94.7	238	99	52	84	60	-	7.4	111	14.6	84	47
6021	89.1	255	144	115	61	89	-	11.3	178	18.0	57	81
6261	75.9	184	141	123	121	98	25	3.7	154	14.3	43	92
6111	72.9	289	96	113	106	68	-	12.9	228	18.9	81	67
6081	72.8	221	73	141	112	75	-	8.1	455	25.3	50	127
6023	71.3	191	92	101	111	113	-	11.9	219	15.4	49	117
6262	70.4	169	40	122	48	140	-	10.5	149	19.6	46	127
6115	66.2	172	331	160	54	77	29	9.4	102	15.2	477	81
6121	59.4	159	77	63	149	125	45	7.4	117	20.9	41	119
6041	55.9	188	95	88	137	109	-	2.8	198	10.7	49	43
6113	52.4	158	83	121	155	107	176	5.9	191	17.4	36	66
6112	39.8	107	92	105	43	55	126	11.2	261	16.4	108	50
6151	35.4	207	115	124	77	83	-	6.4	254	21.2	50	89
6201	10.7	177	113	62	91	40	-	8.6	124	15.8	62	39
6114	10.3	203	118	96	35	99	186	8.3	170	21.6	77	59
Avg.	99.9	221.7	102.3	100.2	107.0	99.8	99.6	8.9	193	20.07	74.0	92.3
High	323.4	341	163	160	249	184	204	19.5	455	40.2	477	192
Low	10.3	107	40	52	35	26	25	2.8	73	10.7	30	39

It is significant that among the ten lowest farms ranked according to operator's labor earnings, not one farm is above the average in pounds of butterfat per cow.

Measure of Farm Organization and Management Efficiency - Con'd

Farm No.	Index of crop yield	Per cent crop acres in legumes	Index of productive man work units per worker	Index of farm power expense	Index of general mach. & equip. expense	Index of bldg. & fencing expense	Gross returns per \$100 expense	Total No. productive man work units
6192	113	28	116	75	80	150	\$223	814
6083	105	0	101	108	33	68	327	633
6131	101	15	178	114	40	4	499	648
6231	112	19	91	95	68	79	468	325
6082	116	9	92	101	90	54	267	510
6061	98	6	85	47	195	36	332	389
6194	101	19	111	91	113	139	286	411
6191	100	11	119	131	113	111	184	777
6022	80	7	77	104	120	46	205	483
6122	112	22	86	65	105	89	258	516
6051	97	4	93	71	128	104	235	531
6132	110	13	89	102	78	100	256	565
6031	93	11	97	116	180	171	218	615
6021	105	6	75	76	75	71	301	320
6261	84	0	110	111	3	75	249	435
6111	90	11	80	90	185	57	208	337
6081	115	8	99	86	70	325	178	472
6023	94	8	121	121	127	125	216	568
6262	86	11	128	82	83	171	186	887
6115	89	20	70	116	73	75	366	244
6121	91	10	113	78	38	57	313	420
6041	101	5	80	104	68	118	266	434
6113	76	4	57	120	235	50	316	186
6112	98	12	122	91	113	96	225	503
6151	100	10	123	108	123	178	173	612
6201	94	0	79	111	80	71	173	549
6114	96	12	109	175	75	114	155	512
Avg.	98.3	11.16	100.0	99.6	99.7	101.2	262.4	507.3
High	116	28	178	175	235	325	499	814
Low	76	0	57	47	3	4	155	186

Measure of Farm Organization and Management Efficiency

Index of operator's earnings	Lbs. of B.F. per cow	Returns per \$100 of Feed					Average No. of cows per 100 acres	Lbs. pork produced per acre*	No. of productive livestock units per 100 acres	Feed cost per other cattle unit	Eggs per hen
		Cows	Hogs	Other cattle	Poultry	Sheep					
250	400	\$190	\$160	\$220	\$190	\$210	21	430	44	\$135	212
225	370	175	150	210	175	200	19	390	40	125	192
200	340	160	140	190	160	180	17	350	36	115	172
175	310	145	130	170	145	160	15	310	32	105	152
150	280	130	120	150	130	140	13	270	28	95	132
125	250	115	110	130	115	120	11	230	24	85	112
100	220	100	100	110	100	100	9	190	20	75	92
75	190	85	90	90	85	80	7	150	16	65	72
50	160	70	80	70	70	60	5	110	12	55	52
25	130	55	70	50	55	40	3	70	8	45	32
-	100	40	60	30	40	20	1	30	4	35	22

*Corn for grain, oats, barley and mixed small grains.

The efficiency in feeding of livestock is shown for each class of livestock; the size of the cow and hog enterprises are set up separately; and power, general machinery and equipment, and building expense are divided so that each farmer can analyze his business thoroughly. The net effect is shown of boosting up receipts and keeping down expenses in the measure designated: Gross Returns per \$100 expense.

Measure of Farm Organization and Management Efficiency - Cont'd

Index of crop yield	Percent of crop acres in legumes	Index of productive man work units per worker	Index of farm power expense	Index of general mach. & equipment expense	Index of bldg. & fencing expense	Gross returns per \$100 expense	Total No. of productive man work units	Crop Acres per Horse	
								With tractor	Without tractor
122	29	190	10	10	10	500	980	39	38
118	26	175	25	25	25	460	900	36	35
114	23	160	40	40	40	420	820	33	32
110	20	145	55	55	55	380	740	30	29
106	17	130	70	70	70	340	660	27	26
102	14	115	85	85	85	300	580	24	23
98	11	100	100	100	100	260	500	21	20
94	8	85	115	115	115	220	420	18	17
90	5	70	130	130	130	180	340	15	14
86	2	55	145	145	145	140	260	12	11
82	-	40	160	160	160	100	180	9	8

Crop index is a comparison of the yield per acre of all crops on each farm with the average of all crops on the 27 farms.

An index of expense is a comparison of each farmer's expense with the average of the 27 farms. The power, machinery and building expenses are calculated as so much expense per productive man work unit.

Prices Received for Products Sold, Waseca - 1928

<u>Farm No.</u>	<u>Butterfat per lb.</u>	<u>Eggs per dozen</u>	<u>Hogs per 100 pounds</u>
6021	54.7	27.3	8.02
6022	56.3	26.5	8.28
6023	54.2	29.3	8.23
6031	53.2	-	7.91
6041	53.6	28.0	7.83
6051	52.7	27.7	8.08
6061	55.4	27.2	7.86
6081	53.0	28.3	8.10
6082	52.4	25.0	7.81
6083	55.6	30.2	8.56
6111	52.7	28.0	8.66
6112	52.3	32.4	9.04
6113	53.8	26.0	9.61
6114	55.6	29.7	8.29
6115	55.5	31.3	8.03
6121	54.2	28.8	8.05
6122	54.4	25.4	8.34
6131	54.1	-	7.13
6132	53.2	30.2	7.59
6151	55.1	27.1	8.78
6191	54.5	28.6	7.91
6192	60.1	26.0	8.12
6193	52.9	31.4	7.76
6201	51.3	25.4	7.41
6231	54.5	26.4	11.22
6261	53.8	26.6	7.92
6262	55.5	31.4	10.28
<hr/>			
Average	54.2	28.2	7.96
Highest	60.1	32.4	11.22
Lowest	51.3	25.0	7.13

Factors of Cost in Dairy Production (per cow basis)

Farm No.	B. F. per cow	Feed per Cow - Lbs.								Total concentrates	Total dry rgh.	Total digest. nutri.	Total digest. nutri. per lb. B. F.	Nutri- tive ratio	% cows fresh. Sept. to Dec. incl.	Per cent calves born	
		Small Corn grain	Mill feeds	Oil-meal	Tame hay	Wild hay	Alfal. hay	Corn fodder	Silage								
6191	341	723	1521	774	70	-	-	3000	825	7787	30088	3825	5355	15.7	1:6.3	48	96
6022	335	1160	1777	742	92	2250	583	1750	500	-	3771	5083	5328	15.9	1:6.3	65	100
6051	315	-	2216	185	210	840	1511	3023	-	10747	2613	5374	6453	20.4	1:7.1	71	111
6194	299	102	1673	-	125	1000	-	4418	-	9636	1900	5418	5779	19.3	1:5.7	73	100
6111	289	376	1575	869	115	307	96	1919	1536	9357	2935	3858	5649	19.5	1:5.7	70	96
6021	255	358	939	367	-	1444	1000	1444	222	-	1664	4110	3268	12.8	1:5.9	88	89
6192	249	580	391	472	39	234	555	2220	584	6934	1482	3603	3969	15.9	1:6.7	42	93
6082	248	-	1352	495	38	295	221	1988	-	13549	1885	2504	4773	19.2	1:7.2	63	118
6231	247	-	1463	-	23	4571	457	1029	1943	-	1486	8000	5023	20.3	1:7.8	90	114
6031	238	77	2139	55	-	-	-	4384	-	5041	2271	4384	4851	20.4	1:5.6	13	164
6061	236	145	991	86	-	3282	-	-	-	4836	1222	3282	3329	14.1	1:8.8	9	95
6081	221	-	1409	554	78	615	-	3744	1846	-	2041	6205	4481	20.2	1:5.1	18	113
6132	216	208	618	352	75	2659	-	2226	557	8287	1253	5442	4920	22.8	1:6.4	77	136
6122	207	223	962	176	16	-	-	5756	-	5511	1377	5756	4914	23.7	1:5.0	61	110
6151	207	-	859	-	8	245	-	2857	490	7918	867	3592	3781	18.2	1:6.3	50	98
6083	206	-	155	-	-	183	-	4131	183	8425	155	4487	3807	18.4	1:5.6	92	110
6114	203	-	311	135	23	1050	-	3151	-	4951	469	4201	3275	16.1	1:5.3	36	83
6023	191	-	475	-	-	-	561	2807	-	8842	475	3368	3998	20.9	1:6.4	50	126
6041	188	356	1021	36	-	-	-	4182	182	-	1413	4364	3277	17.4	1:4.7	75	74
6261	184	480	312	46	-	-	229	2286	1371	5029	838	3886	3441	18.7	1:6.9	70	114
6201	177	-	1438	166	-	-	2737	-	-	-	1604	2737	2491	14.0	1:9.5	44	105
6115	172	1553	33	-	27	-	2133	267	2667	-	1603	5067	3446	20.0	1:11.9	60	67
6131	169	331	1910	-	-	-	-	2600	1182	7447	2241	3782	4847	28.6	1:7.8	31	95
6262	169	246	2045	532	82	-	-	4028	-	6658	2905	4028	5376	31.8	1:5.7	100	95
6121	159	880	749	-	-	2874	-	3043	507	-	1629	6424	4478	28.1	1:6.2	57	59
6113	158	486	720	106	56	5333	1111	-	-	-	1368	6444	4227	26.7	1:6.3	67	67
6112	107	-	121	-	-	-	-	2399	-	5786	121	2399	2289	21.4	1:5.8	43	49
Avg.	222	307	1080	228	40	1006	415	2542	542	5065	1655	4505	4327	20.	1:6.6	59	100

Feeds Costs and Returns from Dairy Cows - 1928
(Per cow basis)

Farm No.	B. F. per cow	Feed Cost per Cow				Feed cost per lb. F. F. cents	Value of Product per Cow						Gross returns per \$100 feed	Per cent sales	% fresh heifers are of total cows	
		Concen.	Rough.	Pasture	Total cost		B. F. sales	Dairy prod. used in house	Skim- milk to other live-stock	Apprec.	Total	Deprec.				Net value of product
6191	341	\$45.98	\$39.56	\$5.97	\$9.51	26.9	\$168.43	\$5.75	\$26.46	-	\$200.64	\$51.00	\$149.64	\$164	14	32
6622	335	55.83	29.50	6.35	91.68	27.3	136.29	7.72	31.81	30.65	206.38	-	206.38	225	25	25
6051	315	41.10	57.01	5.98	104.89	33.0	129.78	12.42	26.84	-	168.96	11.93	157.03	151	34	34
6191	299	31.06	58.34	6.25	95.65	32.	140.31	7.35	24.70	.46	172.82	-	172.82	181	-	9
6111	289	46.78	40.85	6.60	84.23	32.7	129.33	3.99	25.64	13.85	172.81	-	172.81	183	38	-
6021	255	28.02	21.61	6.50	56.13	22.0	121.69	10.44	20.48	1.11	153.72	-	153.72	274	-	-
6192	249	23.35	35.26	6.21	64.82	26.0	140.34	4.15	13.29	4.55	162.33	-	162.33	250	27	23
6082	248	34.18	44.33	6.06	84.57	34.0	108.49	6.91	26.34	-	141.74	16.86	124.88	148	15	37
6231	247	24.03	43.20	6.60	73.83	29.9	124.42	4.40	16.56	-	145.38	.21	145.17	197	11	34
6031	238	34.21	42.63	7.55	84.39	36.7	110.52	6.67	33.91	8.40	159.50	-	159.50	189	55	82
6061	236	19.91	28.07	6.28	54.26	23.0	135.04	10.57	17.92	-	163.53	14.63	148.90	274	26	26
6081	221	31.94	39.44	6.41	77.79	35.3	91.64	10.56	11.74	-	113.94	2.56	111.38	143	-	21
6132	216	20.16	50.28	6.34	76.78	35.5	103.06	5.09	17.66	-	125.81	.12	125.69	164	12	49
6122	207	22.32	52.54	4.90	79.76	38.6	97.17	9.87	15.18	-	122.22	5.42	116.80	146	24	24
6151	207	14.95	40.24	4.49	59.68	34.8	85.13	5.33	20.21	20.47	131.14	-	131.14	220	49	-
6083	206	1.85	47.34	6.07	55.26	26.9	102.13	5.18	17.50	-	124.81	2.47	122.34	221	18	18
6114	203	9.01	39.78	6.45	55.24	27.1	95.63	14.31	14.56	-	124.50	.18	124.32	225	8	-
6023	191	23.34	41.15	5.88	70.37	36.7	111.65	2.75	17.56	-	131.96	8.77	123.19	175	28	7
6041	188	21.69	30.64	6.59	58.92	31.3	79.84	18.57	13.76	-	112.17	6.07	106.10	180	2	-
6261	184	11.03	30.49	4.29	45.72	24.9	80.17	29.21	21.19	-	130.57	7.51	123.06	269	69	57
6201	177	15.62	15.52	6.04	37.18	21.0	78.68	4.44	18.79	-	101.91	3.04	98.87	266	41	35
6115	172	20.35	14.40	6.97	41.72	24.3	87.50	9.06	15.12	-	111.68	8.00	103.68	249	27	13
6131	169	36.12	39.89	6.29	81.30	48.2	81.81	5.96	17.41	-	105.18	4.05	101.13	124	24	18
6262	169	47.76	43.90	6.17	97.83	58.0	81.21	6.98	10.68	-	98.67	5.42	93.45	96	8	12
6121	159	22.41	39.64	6.70	68.75	43.4	76.22	4.72	17.51	2.11	100.56	-	100.56	146	25	-
6113	158	22.22	37.11	6.00	65.33	31.3	84.69	11.81	18.46	-	114.96	12.39	102.57	157	111	22
6112	107	1.49	29.43	6.67	37.59	35.2	44.59	2.78	17.22	1.55	66.05	-	66.05	176	21	14
Avg.	222	26.17	38.19	6.17	70.53	32.8	104.64	8.40	19.57	3.08	135.69	5.94	129.75	192	26.37	21.92

Feed Costs and Returns from ~~Cow~~ Cattle - 1928

Farm No.	Feed Used per Head					Feed Cost per Head					Net value of product per head	Net value of product per \$100 feed	% death loss
	Concen.	Hay & fodder	Silage	Whole milk	Skim-milk	Concen.	Rough.	Milk	Pasture	Total			
6191	699.9	1516.0	2215.7	262.4	1953.4	\$9.16	\$14.25	\$9.90	\$3.01	\$36.40	\$17.53	\$48.16	5.83
6031	-	2352.0	1497.3	865.9	1186.4	-	20.00	20.63	3.38	44.01	56.65	128.72	10.70
6132	165.6	1666.7	1574.1	332.9	626.3	2.18	13.54	8.36	3.21	27.29	46.70	171.12	9.25
6082	76.0	946.0	4459.5	608.1	2211.1	1.50	15.74	17.93	3.00	38.17	64.53	169.06	-
6192	161.2	1681.4	2654.9	157.5	1256.6	2.54	15.13	7.30	3.77	28.74	39.27	136.64	22.12
6051	120.3	1875.0	2109.4	181.3	1842.2	1.75	14.69	8.30	3.35	28.09	61.05	217.34	7.81
6051	109.8	1052.6	2406.0	258.6	2032.3	1.91	10.07	10.49	2.82	25.29	58.42	231.00	7.52
6121	412.6	921.1	-	221.1	1403.9	5.79	5.33	8.02	2.87	22.01	50.33	228.67	-
6122	149.7	914.3	1379.3	345.7	1967.8	2.42	9.31	11.80	2.59	26.12	38.50	147.39	-
6201	295.5	1818.2	-	482.5	1053.9	5.08	10.35	14.89	2.97	33.29	46.42	139.44	-
6261	-	1250.0	2291.7	305.6	1097.9	-	10.21	8.98	3.75	22.94	42.41	184.87	6.94
6083	24.0	250.0	1875.0	168.8	1051.9	.36	5.50	6.33	2.98	15.17	37.75	248.85	-
6262	81.7	2934.8	3043.5	391.3	260.9	1.54	27.17	8.38	2.72	39.81	29.43	73.92	10.87
6022	569.5	537.6	-	419.4	2294.7	7.72	1.94	14.29	3.03	26.98	56.18	208.23	-
6151	64.5	1161.3	2774.2	361.3	1172.6	1.38	12.45	10.30	2.42	26.50	31.42	118.57	6.45
6023	125.3	321.1	3669.7	343.1	1801.4	2.12	9.15	11.67	2.81	25.75	43.69	169.67	36.69
6194	257.8	1354.2	2500.0	487.0	1788.5	4.04	14.84	13.92	2.86	35.66	45.41	127.35	10.42
6131	906.2	1283.2	2123.9	305.3	586.7	14.14	13.80	7.69	3.14	38.77	34.14	88.06	35.40
6111	586.0	1283.0	1981.1	656.6	723.6	9.22	10.53	17.60	2.83	40.18	65.19	162.25	37.73
6112	119.4	2439.1	7073.2	-	893.3	1.72	32.44	16.88	3.43	54.47	36.27	66.59	-
6081	74.3	2160.7	-	528.6	1221.4	.86	12.16	13.30	3.12	29.44	50.47	171.43	17.85
6041	283.3	958.4	-	225.0	2487.9	4.36	6.37	10.80	2.81	24.34	51.05	209.73	-
6231	68.4	3446.6	-	231.1	1576.2	1.28	19.13	8.08	3.34	31.83	21.26	66.79	9.71
6114	68.1	2766.0	2978.8	446.8	1790.4	1.28	24.58	13.59	3.35	42.80	23.20	54.21	31.91
6113	-	2258.1	-	193.6	246.8	-	12.50	4.37	3.51	20.78	47.12	226.76	-
6021	166.7	833.4	-	812.5	1062.5	2.55	3.80	19.23	3.35	28.96	27.24	94.06	20.83
6115	2053.3	6000.0	-	4166.7	4160.0	25.67	15.67	189.00	-	230.34	190.50	82.70	-
Avg.	282.9	1700.7	1800.3	509.5	2858.9	4.09	13.37	18.22	2.98	38.66	48.60	147.10	10.67

Feed Costs and Returns per Animal Unit from Dairy Herd - 1928
(Both cows and young cattle included)

Farm No.	B.F. per cow	Percent cow of cattle units	Feed Cost per Animal Unit				Value Product per Animal Unit			Return per \$100 feed cost
			Concen- trates	Rough- age	Pasture	Total	Dairy products	Sales and appreciation	Total	
6191	341	55.3	\$33.37	\$34.24	\$5.92	\$73.53	\$101.51	\$37.67	\$139.18	\$1.89
6022	335	71.9	44.59	22.32	6.19	73.01	117.63	53.40	171.03	2.34
6051	315	63.3	27.40	43.27	5.72	76.39	96.28	33.78	130.06	1.70
6191	299	67.5	23.35	48.13	5.91	77.39	106.98	27.07	134.05	1.73
6111	289	79.8	41.10	36.89	6.42	84.41	118.33	37.53	155.86	1.85
6021	255	78.8	23.15	18.63	6.55	48.33	112.19	12.32	124.51	2.58
6192	249	68.5	17.53	33.29	6.52	57.34	100.89	26.81	127.70	2.23
6082	248	64.0	22.93	39.37	5.97	68.27	88.05	34.18	122.23	1.79
6231	247	62.7	16.01	41.19	6.60	63.80	87.12	15.56	102.68	1.61
6031	238	64.9	22.23	41.03	7.16	70.42	84.39	43.19	127.58	1.81
6061	236	63.5	13.87	28.13	6.34	48.34	97.40	17.38	114.78	2.37
6081	221	74.7	24.25	34.71	6.13	65.09	79.48	19.75	99.23	1.52
6132	216	58.9	13.59	40.25	6.26	60.10	67.52	36.67	104.19	1.73
6122	207	64.6	16.09	40.36	4.95	61.40	70.48	23.00	93.48	1.52
6151	207	59.7	9.94	33.46	4.51	47.91	58.07	36.00	94.07	1.96
6083	206	57.4	1.36	31.83	5.99	39.18	65.85	30.35	96.20	2.46
6114	203	71.8	7.13	40.99	6.34	54.46	82.36	11.63	93.99	1.73
6023	191	71.3	17.82	34.38	5.73	57.93	86.79	12.84	99.63	1.72
6041	188	69.7	17.79	25.27	6.31	49.37	71.37	26.85	98.22	1.99
6261	184	53.1	5.87	25.09	5.56	36.52	59.86	33.12	92.98	2.55
6201	177	69.0	13.70	16.66	5.88	36.24	61.77	24.58	86.35	2.38
6115	172	96.3	21.57	15.07	6.71	43.35	92.96	6.97	99.93	3.30
6131	169	73.3	37.39	35.25	6.15	74.79	73.06	13.74	86.80	1.16
6262	169	71.4	34.97	46.06	5.88	86.91	69.57	12.03	81.60	.94
6121	159	59.3	17.73	27.61	6.16	51.50	51.81	39.65	91.46	1.78
6113	158	71.5	15.89	32.91	6.02	54.82	80.09	15.46	95.55	1.74
6112	107	77.4	1.93	37.32	6.70	45.95	42.26	17.46	59.72	1.30
Avg.	222	68.1	19.94	33.47	6.10	59.51	82.37	25.89	108.26	1.91

Factors of Cost in Pork Production

Farm No.	Feed cost per 100# pork	Pounds pork produced	Lbs. of feed per 100# of pork					Value feed per 100 lbs. Total			Total Feed cost	Total No. of litters	Average No. of pigs per litter	Returns per \$100 of feed	Nutri- tive ratio	
			Corn	Small grain	Mill feeds	Total grain	Tank.	Skim- milk	Grain & mill feeds	Tank. & skim- milk						Pasture
6131	\$3.90	23325	140	48	-	188	-	346	\$2.63	\$.86	\$.41	\$3.90	14	8.3	\$193.28	1:5.6
6115	4.32	4570	306	8	9	323	-	-	3.75	-	.48	4.32*	4	8.3	195.38	1:9.9
6061	4.84	9058	274	40	-	314	-	400	3.53	1.00	.31	4.84	8	4.6	166.92	1:6.8
6261	5.08	13270	247	93	8	347	9	88	4.20	.51	.37	5.08	5	3.6	150.0	1:7.6
6081	5.38	27326	323	29	30	382	6	59	4.71	.34	.33	5.38	16	7.8	160.36	1:8.7
6021	5.68	9095	215	105	11	331	-	405	4.46	1.01	.21	5.68	7	7.1	140.65	1:6.2
6194	6.23	10592	267	116	-	383	2	446	4.79	1.18	.18	6.23**	7	6.0	128.62	1:6.5
6111	6.72	9571	131	207	30	368	-	448	4.84	1.62	.26	6.72	10	7.1	138.00	1:5.2
6151	6.73	24350	355	107	18	480	-	135	6.14	.34	.25	6.73	17	4.9	151.36	1:8.3
6023	6.81	15992	374	127	-	501	-	255	5.80	.64	.37	6.81	17	6.2	123.00	1:8.0
6192	6.88	9623	246	143	32	421	2	293	5.65	.81	.42	6.88	9	5.7	118.01	1:7.5
6201	7.03	13600	329	137	17	483	-	323	6.02	.81	.20	7.03	13	3.9	76.07	1:7.3
6112	7.10	17475	210	242	-	452	-	238	6.20	.61	.20	7.10***	12	6.8	128.04	1:7.2
6191	7.13	21275	326	149	12	487	-	390	5.91	.98	.24	7.13	16	6.4	114.18	1:7.1
6113	7.16	5145	263	167	3	433	2	540	5.15	1.42	.59	7.16	5	7.7	148.66	1:5.8
6114	7.17	12395	310	147	37	494	-	199	6.43	.49	.25	7.17	9	5.7	118.16	1:7.4
6041	7.23	22087	306	198	-	504	2	38	6.66	.16	.41	7.23	15	7.2	108.28	1:8.4
6082	7.73	21442	291	223	36	550	2	165	6.96	.46	.31	7.73	9	8.1	114.28	1:7.4
6262	8.53	14760	370	124	-	494	1	603	6.62	1.56	.35	8.53	11	6.3	149.66	1:6.0
6122	8.57	8600	407	217	-	624	-	153	7.99	.39	.19	8.57	7	4.4	95.95	1:8.2
6022	8.72	13967	490	95	$\frac{1}{2}$	585 $\frac{1}{2}$	-	670	6.72	1.68	.32	8.72	13	5.2	96.20	1:6.9
6051	8.85	13157	365	200	30	595	-	355	7.73	.89	.23	8.85	5	8.0	75.59	1:7.2
6132	9.20	14560	627	172	-	799	1	289	8.17	.76	.27	9.20	13	4.9	83.16	1:8.3
6121	9.57	7000	672	9	-	681	-	426	7.82	1.07	.68	9.57	-	-	77.27	1:8.3
6083	10.61	19879	388	201	-	589	7	161	9.68	.59	.34	10.61	28	4.8	91.07	1:5.3
6031	13.06	8752	736	112	-	848	-	1057	10.01	2.64	.41	13.06	14	4.4	63.19	1:6.8
6231	13.97	3830	44	628	-	682	-	929	11.02	2.32	.63	13.97	1	6.0	98.46	1:4.9
Avg.	7.56	13878	334	150	101	494	1.2	356	6.28	.94	.34	7.56	10.6	5.9	122.40	1:7.1

*Includes some mangels

** " " alfalfa

*** " " " and silage

Feed Costs and Returns for Poultry

Farm No.	Total Feed per 100 hens		Cost of Feed per 100 Hens			Dozen of eggs per 100 hens	Value per 100 Hens			Returns per \$100 feed cost	Eggs laid per hen
	Grain	Skim-milk	Grain	Skim-milk	Total		Eggs	Poultry	Total		
6131	14062	8962	\$179.95	\$22.38	\$202.33	1075	\$919.84	\$785.40	\$1705.24	\$454.59	129
6082	6200	7650	79.75	19.10	98.85	867	425.35	186.60	611.95	430.30	104
6083	4447	2148	67.15	5.37	72.52	617	280.07	116.20	396.27	386.19	74
6262	4764	4513	98.65	11.28	109.93	1058	379.34	50.65	429.99	345.06	127
6121	11829	5680	154.39	14.20	168.59	991	519.80	230.07	749.87	308.33	119
6231	4472	3326	69.34	8.32	77.66	467	232.65	119.75	352.40	299.61	56
6192	10670	4554	171.55	11.38	182.93	1600	535.64	118.28	653.92	292.80	192
6132	5159	-	72.56	-	72.56	358	206.53	102.93	309.46	289.22	43
6023	6137	6626	100.94	16.57	117.51	975	328.13	45.17	373.30	279.25	117
6041	8204	1021	119.57	2.56	122.13	358	329.80	229.65	559.45	270.00	43
6151	7869	8332	123.94	20.83	144.77	966	385.71	117.59	503.30	266.55	116
6113	2677	-	62.39	-	62.39	5500	165.24	19.73	184.97	264.87	66
6191	10419	7741	161.14	19.35	180.49	1358	448.75	61.70	510.45	248.63	163
6114	7195	818	104.97	2.04	107.01	491	260.72	115.26	375.98	243.63	59
6261	4464	5174	77.11	12.94	90.95	767	218.26	13.87	231.13	242.38	92
6194	17485	5549	295.19	13.87	309.06	1566	882.00	395.23	1277.23	237.11	188
6021	10584	-	140.07	-	140.07	675	305.90	113.52	419.42	218.37	81
6061	9785	3675	159.07	9.19	168.26	683	361.76	149.96	511.72	215.01	82
6151	10722	1038	112.32	2.60	114.92	741	328.46	103.42	431.88	205.07	89
6115	12908	-	174.52	-	174.52	675	335.60	114.84	450.44	192.47	81
6081	13328	-	204.69	-	204.69	106	378.75	78.94	457.69	185.03	127
6122	8496	4096	121.82	10.23	132.05	550	224.84	78.67	303.51	170.26	66
6111	8681	9770	101.14	24.43	125.57	558	211.03	55.58	266.61	168.05	67
6031	9862	1319	146.64	3.29	149.93	391	333.39	226.91	560.30	147.61	47
6112	5355	786	81.07	1.98	83.05	417	112.86	-19.56	93.30	135.90	50
6201	5936	-	93.76	-	93.76	325	93.43	11.67	105.10	99.65	39
6022	28425	5760	490.65	14.40	505.05	641	324.87	152.17	477.04	64.32	77
AVG.	9265	3650	139.42	9.12	148.54	918	352.92	139.75	492.66	246.67	92

Feed Cost for Horses - 1928

Farm No.	% colts are of horses	Feed per Horse			Feed Costs per Horse				Crops acres per horse	Tractor used for field work
		Grain	Tame hay & alfalfa	Wild hay & fodder	Grain	Rough.	Pasture	Total		
6113	25.0	444	-	2222	\$7.08	\$9.33	\$5.82	\$19.68	12	Yes
6192	-	697	1587	1905	8.82	16.98	3.97	29.77	14	Yes
6021	-	1096	1081	2027	15.98	14.12	3.38	34.48	19	No
6061	-	1071	-	3083	14.49	17.67	3.37	35.53	14	Yes
6261	-	1668	-	2375	23.43	9.69	3.13	36.25	25	Yes
6112	-	1087	-	3333	16.60	18.78	3.38	38.76	12	Yes
6051	-	1667	167	4000	25.50	18.58	1.56	45.64	23	No
6031	3.5	2726	-	3221	31.74	11.61	2.54	45.89	25	Yes
6231	-	1568	1833	333	27.27	12.08	7.00	46.35	12	No
6023	-	1722	600	3200	27.81	18.40	3.25	49.46	23	No
6111	-	2308	2500	250	35.38	13.63	-	49.01	19	No
6121	50.0	2112	1200	2000	31.71	14.60	3.85	50.16	24	Yes
6083	-	2470	1449	580	37.83	9.57	2.92	50.32	21	Yes
6194	58.3	1828	-	5310	27.91	21.45	4.12	53.48	23	No
6122	40.3	1609	2000	2167	25.82	24.83	2.92	53.57	27	No
6081	20.0	3158	1455	364	42.01	11.82	2.84	56.67	16	No
6151	-	3434	122	2073	44.78	9.33	2.74	56.85	15	Yes
6132	-	2946	750	3750	37.34	19.69	1.25	58.28	14	No
6082	-	3189	-	3167	43.77	13.17	3.12	60.06	15	No
6115	66.7	2093	2000	6250	30.28	36.12	2.58	68.98	18	No
6041	-	3151	770	4252	48.40	21.63	2.60	72.63	29	No
6191	-	3561	-	5070	54.20	19.44	3.08	76.72	21	Yes
6023	-	3035	-	7547	43.65	32.45	2.34	78.44	31	Yes
6114	-	3118	1143	4250	46.00	32.43	3.07	81.50	14	Yes
6262	-	3562	600	4800	53.88	25.00	3.12	82.00	37	Yes
6231	28.2	3990	1975	1235	60.36	20.00	3.78	84.14	23	Yes
6201	-	4883	2833	-	68.89	16.08	1.50	86.47	23	No
Avg.	10.4	2207	891	2917	34.48	18.09	3.02	55.59	20	-